

UNITED STATES DISTRICT COURT
EASTERN DISTRICT OF TEXAS
LUFKIN DIVISION

PERSONAL AUDIO, LLC		DOCKET 9:09CV111
		JUNE 30, 2011
VS.		8:30 A.M.
APPLE, INC., ET AL		BEAUMONT, TEXAS

VOLUME 6 OF ___, PAGES 1650 THROUGH 2071

REPORTER'S TRANSCRIPT OF JURY TRIAL

BEFORE THE HONORABLE RON CLARK
UNITED STATES DISTRICT JUDGE, AND A JURY

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1 (REPORTER'S NOTES PERSONAL AUDIO V. APPLE,
2 JURY TRIAL, VOLUME 6, 8:30 A.M., THURSDAY, JUNE 30, 2011,
3 BEAUMONT, TEXAS, HON. RON CLARK PRESIDING.)

4 (OPEN COURT, ALL PARTIES PRESENT, JURY NOT
5 PRESENT.)

6 THE COURT: All right. I received a copy of
7 the text of an email dealing with some objections to some
8 demonstratives that Mr. Wicker is evidently going to use
9 dealing with LocType and, in particular, looking at
10 DDX 412, DDX 419, both of them which say "LocType is a
11 required structure." And I'm sure counsel for both sides
12 are well familiar with *Odetics, Inc., versus Storage*
13 *Technology*, 185 F.3d 1259, Federal Circuit 1999 at 1268,
14 especially in light of the instruction we just agreed on
15 yesterday as to structural equivalents. But it is not
16 appropriate and not proper to break a structure into
17 component parts for analysis and then to claim that an
18 individual part is a structure. The LocType is not a
19 structure.

20 Now, it is part of the structure that I
21 identified; and an expert can say, "The court identified
22 this as part of the structure; and, so, they don't have
23 that structure." But that doesn't mean that there still
24 isn't the question of structural equivalents. But
25 anything that says that LocType is a required structure

1 or LocType is not optional or no LocType, no infringement
2 is an incorrect presentation.

3 I mean, I understand the argument, "It doesn't
4 have one of the things that the court has said in the
5 structure; so, obviously we don't have this structure."
6 But LocType is not a structure.

7 So, I'm going to sustain the objection to
8 that; and I think you would now have time to change those
9 titles and so forth. And let's be very careful about
10 this, especially in view of the definition that I gave
11 the jury, based in part upon that *Odetics* case. Okay?

12 Is there a question about that?

13 MR. ELACQUA: No, your Honor.

14 THE COURT: I think you'll have plenty of time
15 to make that change.

16 I think that takes care of your objection,
17 correct?

18 MR. HOLDREITH: Yes, sir.

19 THE COURT: Okay. All right. We've got a
20 minute or two before the jury will be here, I guess.

21 I think Mr. Heartfield had it right. This is
22 the longest 46-hour trial, weekwise, that I've ever been
23 involved in. Three weeks for 46 hours.

24 (Discussion off the record.)

25 (The jury enters the courtroom, 8:32 a.m.)

1 THE COURT: Good morning, ladies and
2 gentlemen. Welcome back. We'll start -- or continue on
3 with the witness.

4 Counsel.

5 MR. SCHUTZ: Thank you, your Honor.

6 CONTINUED CROSS-EXAMINATION OF DAVID HELLER

7 BY MR. SCHUTZ:

8 Q. Good morning, Mr. Heller.

9 A. Good morning.

10 Q. How are you this morning?

11 A. I'm fine. Thank you.

12 Q. Mr. Heller, I'd like to return to where we left
13 off yesterday, which is with Defendant's Exhibit 197. Do
14 you have that in front of you? It should be in the book
15 that your counsel handed you yesterday.

16 A. Yes, I do.

17 Q. And, of course, to refresh our recollection, this
18 is a patent on which you are a named inventor, correct?

19 A. Yes.

20 Q. And if you would, sir, go to the page marked --
21 the page I have on the screen here. It's Column 5 at the
22 paragraph beginning at line 50. Let me know when you're
23 there, sir.

24 A. I am.

25 Q. And we talked yesterday that the cable 212 can be

1 a FireWire cable or universal serial bus cable, correct?

2 A. Yes.

3 Q. And then alternatively, the cable could be
4 replaced by a wireless link, correct?

5 A. Yes. That's what it says.

6 Q. And then I've also given you a binder up there,
7 and in there is a tab that contains Plaintiff's
8 Exhibit 36 [sic]. Can you find that?

9 A. No. It does not appear to be there.

10 Q. It's in there somewhere. Should be.

11 MR. CORDELL: Your Honor, I don't have it
12 either.

13 MR. SCHUTZ: All right. Well, I've got a
14 clean copy I can provide the witness; and it was talked
15 about yesterday.

16 It's an admitted exhibit, your Honor. I'll
17 put it up on the screen.

18 May I approach, your Honor?

19 THE COURT: What was the binder cover? Was it
20 part of the Heller exhibits?

21 MR. SCHUTZ: It should be the Heller exhibits
22 I just -- and I apologize, your Honor.

23 THE COURT: That's okay.

24 A. I'm sorry. You said 36? This is 346.

25 *

1 BY MR. SCHUTZ:

2 Q. It's 346.

3 A. That is here, yes.

4 Q. I'm sorry. My mistake. I'm sorry. 346.

5 Just not too far from you in Silicon Valley is
6 a company called "Hewlett-Packard," right?

7 A. Yes.

8 Q. And they have a laboratory, right?

9 A. I would assume so.

10 Q. And this document, which was admitted yesterday,
11 is from Hewlett-Packard Labs; and among the things it
12 talks about is the IrDA association and the IrDA standard
13 and it talks about IrDA being a wireless communications
14 technology. Do you see that?

15 A. I see that.

16 Q. You do not disagree with that, do you, sir?

17 A. I do not.

18 Q. Okay. Thank you.

19 Let's go back to your patent, which is
20 Defendant's Exhibit 197. And what I'd like to do is,
21 just so we've got established in our mind some dates
22 here -- do you remember the date, again, that the
23 Personal Audio patents were applied for at the Patent
24 Office?

25 A. Yes.

1 Q. And what day is that?

2 A. 1996.

3 Q. '96. All right. So, can you tell us -- this is
4 your patent here -- when you and your fellow inventors
5 went to the Patent Office?

6 A. The date of filing was 2002.

7 Q. And, so, that's about five and a half years
8 actually after Mr. Logan and his colleagues went to the
9 Patent Office for the patents in this case, right?

10 A. Yes.

11 Q. I just want to make sure that we have in mind the
12 dates of the other two patents that Mr. Cordell showed
13 you yesterday. They should be in the book that he handed
14 you. And let's take Defendant's Exhibit 195 and put that
15 on the screen. That's another one of your patents,
16 right, sir?

17 A. Yes, it is.

18 Q. And that was applied for when?

19 A. In 2002.

20 Q. Yes, 2002. So, again, about the same time, five
21 and a half years or so after Mr. Logan and his colleagues
22 went to the Patent Office, correct?

23 A. About five years after, yes.

24 Q. And then let's go to -- I'm sorry. That is
25 Defendant's Exhibit 170. I think we've got them all.

1 So, we've got those three.

2 You mentioned that Apple has 3,000 patents?

3 A. Yes, over 3,000.

4 Q. Are they all valid?

5 A. I do not know.

6 Q. Do you know if any of them are invalid?

7 A. I do not know.

8 Q. As you sit here, you're not aware if any of them
9 that are invalid, right?

10 A. No.

11 Q. You think all 3,000 of Apple's patents are good
12 patents?

13 A. I think there are a lot of good patents in there.
14 I can't say that they all are.

15 Q. But the two patents in this case -- and you're the
16 Apple corporate representative -- you think those two
17 patents are invalid, right?

18 A. That's Apple's position.

19 Q. How many patents do you have, sir?

20 A. 26.

21 Q. Are they all good patents?

22 A. I think they are, yes.

23 Q. Any of your 26 patents invalid?

24 A. No.

25 Q. But the two in this case you think are invalid?

1 A. Yes.

2 Q. Mr. Heller, have you ever suggested to anyone at
3 Apple that any of the features or capabilities of the
4 iPods be removed?

5 A. Not to my recollection, no.

6 Q. If Mr. Jobs were to come to you and say,
7 "Mr. Heller" -- he might call you "Dave," but I'll call
8 you "Mr. Heller" -- "we've got to take some features or
9 capabilities off the iPod, and I need some help. What
10 should we take off," where would you start? What's the
11 first thing you'd remove in terms of a feature or a
12 capability of the iPod?

13 A. I have a personal list of what I would remove.

14 Q. And what would you remove?

15 A. I would remove games.

16 Q. Okay. And what's the second thing you'd remove?

17 A. Probably contacts and calendars.

18 Q. What else would you remove?

19 A. I don't know.

20 Q. Would you ever suggest removing the capability to
21 receive or download navigable playlists?

22 A. No.

23 Q. Would you ever -- why not?

24 A. Removing a feature is very, very hard on the
25 customers.

1 Q. But what if the feature's, you know, not worth
2 anything?

3 A. Excuse me?

4 Q. Well, what if it's not worth anything? I mean,
5 the being able to download playlists that you can
6 navigate through on the iPod, why not just remove that?

7 MR. CORDELL: Your Honor, I object. This is
8 hypothetical, and he's not an expert.

9 THE COURT: Overruled.

10 A. We have removed features in *iTunes*, and we've
11 found that customers who have used those features do not
12 like to do that.

13 BY MR. SCHUTZ:

14 Q. Yeah. I'm -- did you mean *iTunes* or iPod?

15 A. *iTunes*.

16 Q. Okay. I'm talking about iPod.

17 A. I've never been involved in removing a feature
18 from an iPod.

19 Q. Okay. But you have iPods?

20 A. Yes.

21 Q. And this is a case about iPods?

22 A. Yes.

23 Q. Well, would you ever -- would it ever even dawn on
24 you to go to your boss at Apple and say, "We really don't
25 need to have iPods be able to download playlists that you

1 can navigate through"?

2 A. I don't see myself doing that, no.

3 Q. Well, what about, you know, something a little bit
4 less draconian? "We can download playlists, but let's
5 get rid of the "skip" buttons"?

6 A. No.

7 Q. Thank you, Mr. Heller.

8 MR. SCHUTZ: Pass the witness.

9 MR. CORDELL: I have just one topic, your
10 Honor, if I may.

11 REDIRECT EXAMINATION OF DAVID HELLER

12 BY MR. CORDELL:

13 Q. Good morning, Mr. Heller.

14 A. Good morning.

15 Q. Mr. Schutz showed you your patent, Defendant's
16 Exhibit 197; and I believe he directed you to Column 5,
17 lines 50 through 57.

18 A. Yes.

19 Q. And there's a reference there to a "wireless
20 link."

21 A. Yes.

22 Q. And he then showed you Plaintiff's Exhibit 346,
23 which was a paper involving IrDA. Do you remember that?

24 A. Yes.

25 Q. I was going to ask you: Can you tell the jury

1 whether or not when your patent talks about a wireless
2 link you were referring to IrDA?

3 A. We were not, no.

4 Q. And why not?

5 A. We were referring at that time to WiFi, which is a
6 standard wireless communication for computers.

7 Q. Why can't you use IrDA?

8 A. IrDA at the time was very slow, and it just never
9 occurred to us. It doesn't charge the device, as
10 Mr. Fadell testified. It is not appropriate for what we
11 would need to use for the device.

12 Q. Thank you.

13 MR. CORDELL: Nothing further.

14 MR. SCHUTZ: Brief follow-up, your Honor.

15 RE CROSS-EXAMINATION OF DAVID HELLER

16 BY MR. SCHUTZ:

17 Q. Let's go back to that patent, Defendant's
18 Exhibit 197, and let's go to Column 5 and let's take a
19 look at that. I'm looking at that really hard. So, it
20 says the "wireless link" there. All right. You know
21 when you go to the Patent Office and try to get a patent,
22 you actually -- you sign an oath, right?

23 A. Yes.

24 Q. And you have to be accurate, right?

25 A. Yes.

1 Q. So, I'm missing the part there where it says can
2 be replaced by a wireless link and, oh, by the way, we
3 don't mean IrDA. What we really mean is WiFi." That's
4 not up there, is it?

5 A. It does not say that, no.

6 Q. So, you didn't tell the Patent Office that.

7 A. No.

8 Q. Now, when you filed this patent in 2002, that was
9 before this lawsuit was filed, right?

10 A. Yes.

11 Q. And it was before you were prepared to testify by
12 the lawyers over here, right?

13 A. It was before this lawsuit.

14 Q. Great. Thanks.

15 MR. SCHUTZ: No further questions, judge.

16 MR. CORDELL: Your Honor, can I ask one
17 question?

18 THE COURT: You may.

19 FURTHER REDIRECT EXAMINATION OF DAVID HELLER

20 BY MR. CORDELL:

21 Q. Mr. Heller, in 2002 did engineers consider IrDA --
22 had they commonly called "IrDA" a "wireless link"?

23 A. I don't know. It was -- I don't know.

24 MR. CORDELL: Thank you, your Honor. Nothing
25 further.

1 THE COURT: All right. You may step down,
2 sir.

3 Next witness?

4 MR. CORDELL: Your Honor, plaintiff calls
5 Mr. Stan Ng; and I'd like to make a brief transitional
6 statement.

7 THE COURT: All right.

8 THE REPORTER: Mr. Cordell, you said
9 "plaintiff" calls?

10 MR. CORDELL: I'm sorry. "Defendant" calls.
11 Yes, thank you.

12 (The oath is administered.)

13 MR. CORDELL: Good morning, ladies and
14 gentlemen. You're now going to hear from Mr. Stan Ng who
15 is one of the original core team members that put
16 together the iPod. Mr. Ng's part of the business is
17 marketing, and he helped define -- what that means in
18 technical companies is not that you're out trying to sell
19 things. What that means is that you actually define the
20 features that go into the product. One of the biggest
21 challenges companies like this face is deciding what to
22 put in the product, what is it that people will
23 ultimately find useful and what is it that's going to
24 make their lives better; and that's what Mr. Ng's focus
25 is.

1 He's going to talk about how they decided to
2 take this jukebox program they had called "*iTunes*" and
3 make it *iTunes* to Go and allow people to take their music
4 with them. He's going to talk about those key marketing
5 messages, the pillar's of Apple's success, having a
6 thousand songs that fits in your pocket and long battery
7 life and the idea that you could have this *iTunes* to go
8 experience and why those features combined to make the
9 iPod the best-in-class product that you've heard so much
10 about.

11 So, with that I'll turn it over to
12 Mr. Stephens and Mr. Ng.

13 DIRECT EXAMINATION OF STAN NG
14 CALLED ON BEHALF OF THE DEFENDANT

15 BY MR. STEPHENS:

16 Q. Good morning, Mr. Ng.

17 A. Good morning.

18 Q. Were you responsible for the marketing messages
19 for the original iPod?

20 A. I was.

21 Q. And what's your current job at Apple?

22 A. My current job is senior director of worldwide
23 product marketing.

24 Q. And what does that involve?

25 A. That involves pulling together the requirements

1 from a marketing perspective, the landscape of the
2 market, understanding what our customers want, really
3 being the voice of the customer within Apple for our
4 products.

5 Q. What's the main reason that people buy iPods?

6 A. Well, it's really stayed the same over the past
7 ten years. It's really been all about the combination of
8 great portability and great storage, the ability to carry
9 all of your music with you at all times.

10 Q. I'd like to back up, Mr. Ng, and talk about your
11 background. Where did you grow up?

12 A. I grew up in south Pasadena, California.

13 Q. And where do you live now?

14 A. I live in Los Altos, California, northern
15 California, now.

16 Q. Are you married?

17 A. Yes, I am.

18 Q. Any kids?

19 A. Yeah. Two beautiful kids, a 9-year-old daughter
20 and 5-year-old son.

21 Q. Do they have iPods?

22 A. Yeah. They love music. Yeah, they do.

23 Q. Do you have any patents?

24 A. Yes, I do.

25 Q. How many?

1 A. Maybe about half a dozen that have been issued and
2 maybe a dozen that are still in application.

3 Q. Where did you go to school, Mr. Ng?

4 A. Well, having grown up on the West Coast, I decided
5 to go to the East Coast for school; so, I went to Yale
6 University in Connecticut.

7 Q. And what did you study?

8 A. I studied psychology.

9 Q. And what were you planning on as a career?

10 A. Well, when you're that young, you don't really
11 know for sure; but when I went into college, I thought
12 that I'd learn a lot about children and education and
13 maybe one day become a teacher.

14 Q. Did you work during college?

15 A. Yeah. College was not cheap; so, I was working as
16 a computing assistant in the university for about 20 to
17 30 hours a week.

18 Q. When did you first realize you wanted to work at
19 Apple?

20 A. Well, I'd always admired Apple. My parents had
21 bought my brother and I an Apple IIe computer, you know,
22 when I was in elementary school; and we had a lot of fun
23 with it. It was a really kind of cool computer and, you
24 know, from that point on I thought, wow, you know, Apple
25 is kind of cool. They do some really neat things; and,

1 so, I'd always had kind of an interest in the company.

2 Q. How was it that you came to work at Apple?

3 A. Well, you know, having my background, you know,
4 supporting as a computing assistant during college as I
5 was paying my way through college, I got a lot of
6 experience, a lot with the Macintosh. And, so, when I
7 graduated -- or soon before I graduated, I interviewed
8 with Apple and they didn't have a position open at that
9 time, unfortunately; but a couple years after that -- I'd
10 kept in touch with the hiring manager, and she told me
11 that there was a position open. And this was in 1995.
12 And, so, I interviewed for that position there and got a
13 job.

14 Q. And what was your first position at Apple?

15 A. My first job at Apple in '95 was as a systems
16 engineer, a systems engineer in our K through 12
17 education division.

18 Q. And what did that entail?

19 A. Well, the systems engineer job as part of the
20 Apple K-12 education division, what they did is they went
21 to schools and consulted with teachers to help them with
22 technology, help them -- you know, "How do I integrate a
23 Mac into my curriculum" or "How do I use a Mac in my
24 classroom." So, I was doing that to help schools out.

25 Q. And what did you do next at Apple?

1 A. Well, I did that for two years; and then in 1997,
2 after I got married, my wife and I moved up to Cupertino,
3 California, where Apple's headquarters are; and I took a
4 job in product marketing to really start defining the
5 Macs that we would create for education, again still in
6 K-12 education. So, it really was helping to define and,
7 again, being the voice of the customer for Macs that we
8 developed specifically for K-12 education.

9 Q. And how long were you in that position?

10 A. That position, probably about a year to year and a
11 half.

12 Q. And what did you do next at Apple?

13 A. Next, I moved over to working on some of our
14 professional systems, our Power Mac line, and started to
15 help define some of the systems that we would build
16 there.

17 Q. And how long were you doing that?

18 A. Probably until 1999.

19 Q. What did you do after that at Apple?

20 A. Well, the next thing I did was I transitioned over
21 to a new product that we were working on called the
22 "Power Mac G4 Cube"; and that was a product that we were
23 working on which kind of sat between the consumer and the
24 professional market.

25 Q. And how long were you involved with the G4 Cube?

1 A. Through to 2000, kind of fall to end of 2000.

2 Q. And what did you do after the G4 Cube?

3 A. Well, the G4 Cube was a product that, you know, we
4 had introduced in the summer of 2000 and we knew a couple
5 months in that unfortunately it wasn't going to be very
6 successful. And, so, about three months after the
7 launch, you know, I was trying to figure out, well, what
8 do I do next because this thing looks like it's going to
9 be a flop.

10 So, I went to go talk to my VP of product
11 marketing, Mr. Phil Schiller, and asked him, you know,
12 "What should I be doing next? What's my next job?" I
13 mean, I loved Apple. I wanted to stay there. Right?
14 But the project I was on was kind of going downhill.

15 And, so, I talked to him about a couple
16 different options. You know, there are three options
17 that we had kind of discussed. One was potentially going
18 over to China to work as a marketing manager. The second
19 was maybe engaging in this new project to build some
20 servers for Apple. And the third was a music project
21 that he said at the time we were potentially going to get
22 into.

23 Q. And which of those options did you pick, Mr. Ng?

24 A. I picked the music project.

25 Q. And why was that?

1 A. Well, I guess a couple reasons. One, when I
2 thought about it -- the server project didn't really seem
3 the core of Apple's business. You know, Apple's kind of
4 always built stuff for consumers; and, so, servers seemed
5 a little bit of a stretch, a little bit less interesting
6 to me.

7 China -- I thought, yeah, we were starting to
8 grow in China; but my wife and I would have to move there
9 and, you know, if I wanted to go work in China, China
10 would always be there.

11 So, music was very interesting. You know, I
12 thought, "Well, I love music and, you know, what better
13 way than to kind of investigate what Apple might do in
14 that space."

15 Q. When did you take on this new project?

16 A. Well, I talked to Mr. Schiller again in January of
17 2001; and he told me, "Hey, look, we want to get this
18 started. We want to get this project going. So, I'd
19 like to pair you up with a consultant who would focus on
20 the technical side where you would focus on the marketing
21 side." So, he said, you know, "Let's get started; and,
22 you know, we'll get going pretty soon, as soon as we hire
23 this consultant."

24 Q. What was Apple's reason for getting involved in
25 this project?

1 A. Well, what Mr. Schiller told me was that -- there
2 was a couple things going on in 2000 at the time. It was
3 kind of this real confluence of things that were coming
4 together; and, you know, one of those things is working
5 on this jukebox software called "*iTunes*" which was for
6 the Mac so that you could, you know, manage your digital
7 music on your computer, your Mac.

8 And people had been using *iTunes* and
9 connecting them up to other MP3 players at the time and
10 found that those MP3 players weren't that great. It
11 wasn't that great an experience. It wasn't really, you
12 know, what people wanted when they took their music, you
13 know, on the go.

14 And, secondly, Mr. Schiller told me that
15 Toshiba -- a company had come to Apple to propose a new
16 hard drive technology, this smaller hard drive that
17 didn't have the same kind of capacity as what you'd
18 normally put in a laptop computer but was still very
19 small and still had a good amount of storage. So, he
20 said that, well, people are looking at that and thinking
21 maybe that could be used for a music player.

22 And, so, the combination of these two events
23 kind of led Apple -- at least this is what Mr. Schiller
24 told me -- to really invest a little bit and say, "Okay.
25 Let's get into this. Let's investigate at least if there

1 is something to do in the portable music space."

2 Q. Mr. Ng, you mentioned a consultant. What was the
3 team that was involved at the beginning of this project?

4 A. Well, I guess you can call two people a team; but
5 there was just basically Mr. Fadell and myself. It was
6 kind of an interesting coincidence because, you know, I
7 was in Japan at the time still working on the Power Mac
8 line and this was at the end of January and he sent me an
9 email and said to me, "Hey, you know, I'm this consultant
10 that's been hired by Apple on the engineering side and,
11 you know, I'm going to be working with you and by the
12 way, I know your brother." So, it was this really
13 strange coincidence.

14 And I said, "All right. Let's get started as
15 soon as I'm back from Japan." And we started meeting
16 actually in February.

17 Q. Now, was this project called the "iPod Project" at
18 the time?

19 A. No. The iPod name came much later.

20 Q. What was it called at that point?

21 A. Well, we didn't really have a specific name for it
22 at that time, when Tony and I -- sorry -- when Mr. Fadell
23 and I were just meeting and investigating. We kind of
24 looked at it as, well, we want to take that *iTunes*
25 experience to go; so, what are we going to do about

1 *iTunes* to go? And this is this portable music project.

2 So, we didn't really have a specific name for it at that
3 time.

4 Q. Was it public knowledge at Apple what you and
5 Mr. Fadell were doing?

6 A. Oh, no. It was totally top-secret.

7 Q. Why is that?

8 A. Well, first, it was an investigation. So, we
9 didn't even know if this was something that would come,
10 you know, to anything or not. And, so, we wanted to keep
11 it secret because if it didn't come to anything, then
12 there wouldn't be any rumors or anything like that.

13 The second reason -- this is kind of applied
14 to Apple in general's reason why we keep a lot of things
15 secret, is because when we create a product, we like to
16 introduce it and then really surprise people. I mean,
17 our goal -- and we kind of say it a lot at Apple. We
18 like to surprise and delight, you know, our customers.
19 And, so, we wanted to keep it secret until we were
20 actually able to bring it out to the world.

21 Q. Were you at least able to tell your wife and
22 family about it?

23 A. No. That would cause a lot of concern actually
24 but -- no. I couldn't tell my wife at all.

25 Q. Did you use any kind of code names or anything

1 I like that for the project?

2 A. Yeah. Eventually we did. We came up with --
3 there was an engineering code name called "P68."

4 Q. Any other code names?

5 A. And then also I'd come up with a code name that we
6 used internally called "Dulcimer."

7 Q. And you came up with that name, you said?

8 A. Yeah, I did.

9 Q. How did you come up with the name?

10 A. Well, I was -- I thought that it had to be
11 something music-related since we were creating a portable
12 music player; and, so, Dulcimer was, you know, supposedly
13 this very sweet-sounding instrument. So, I thought, you
14 know, it was kind of an appropriate name.

15 Q. What was your role in the *iTunes* to Go
16 investigation?

17 A. Well, my role was primarily to be focused on
18 investigating the market, understanding kind of what
19 other players were out there, looking at the landscape of
20 competition, and really investigating, you know, what
21 were the strengths and weaknesses of the products that
22 existed at the time.

23 Q. In your research of the market, did you ever hear
24 of a company called "Personal Audio," the plaintiff in
25 this lawsuit?

1 A. No.

2 Q. Have you ever heard of James Logan?

3 A. No.

4 Q. Charles Call?

5 A. No.

6 Q. Daniel Goessling?

7 A. No.

8 Q. Did you ever hear of the patents in this lawsuit
9 before this case?

10 A. No.

11 Q. What was Mr. Fadell's role in the *iTunes* to Go
12 project?

13 A. Well, Tony -- I'm sorry -- Mr. Fadell's role was
14 to really be the technical arm of this two-man team. He
15 was tasked with just all the investigation of the
16 technology, the components, the things that it would take
17 to actually build, you know, a portable music player.

18 Q. Did you investigate the other kinds of products
19 that were in the marketplace at the time?

20 A. Yes, I did.

21 Q. And what kind of investigation did you do of those
22 products?

23 A. Well, I read a lot about them. I mean, I'd read
24 as many reviews as I could; and I bought a lot of the
25 products as well to test and experience myself, see how

1 they really were as music players.

2 Q. And why did you do that?

3 A. Well, I guess the best way to see what strengths
4 and weaknesses there are is really to give it a try
5 yourself and really see what you like about it. I mean,
6 I'd been using CD players and tape Walkmans, you know,
7 for all my life and, so, being able to use them in kind
8 of the different situations, like whether I'd go, you
9 know, running with them or listen to them, you know, in
10 my house -- I'd give them a try and see what I liked and
11 what I didn't like about them just like any customer
12 would.

13 Q. And what did you see in the marketplace at the
14 time? What observations did you make?

15 A. Well, there was -- there's really two kinds of MP3
16 players, you know, emerging at the time. One was these
17 flash-based MP3 players. And these flash-based MP3
18 players were relatively small; but they only held, you
19 know, anywhere from, you know, eight, ten songs. So, it
20 was really frustrating for customers at the time because
21 you'd carry eight or ten songs of something and it was
22 portable. You know, you could go running with them if
23 you wanted to. But after listening to those eight or ten
24 songs over and over again, you'd have to go back to your
25 computer and transfer some new songs, I mean, wipe it out

1 and transfer some new songs. So, it became kind of a
2 pain for them to constantly, you know, go back and change
3 them. And when we talked about it, it was always like,
4 wow, it was like having that single CD in your car. You
5 never remember to take it out and change it; so, you
6 always ended up with the same music over and over again.
7 It was really frustrating for those customers.

8 So, that was one set of the MP3 players out
9 there at the time. The other set of emerging MP3 players
10 were these hard-drive-based players. And the
11 hard-drive-based players, they were better in that they
12 could hold hundreds and hundreds of songs so you didn't
13 have to go back and change them all the time. But the
14 problem with those was because they used this larger, you
15 know, hard drive, typically used for laptop computers,
16 they were much larger. I mean, they were much heavier,
17 much larger in kind of its form; and it wasn't something
18 that was really truly portable. You could never imagine
19 stuffing this in your pocket or, you know, slapping this
20 thing on your arm to try to go running with it or
21 something. I mean, these were really, really large
22 products.

23 And they also had really bad battery life and,
24 so, even though you had hundreds and hundreds of songs,
25 you'd end up with something that only lasted, you know,

1 three hours, you know, after playing and then you'd have
2 to go back and find a wall outlet and charge them.

3 So, there was really a lot of compromises in
4 the market at the time. You had to -- as a customer, you
5 had to really pick. You were kind of forced between,
6 okay, well, do I get something small but with only a
7 little bit of storage or do I get something with a lot of
8 storage but it's big and clunky.

9 Q. Did any of those players that you've been talking
10 about work with *iTunes*?

11 A. Yes.

12 Q. And what was that experience like? What was your
13 impression of the players that worked with *iTunes* at the
14 time?

15 A. Well, that was also sometimes frustrating for the
16 customers because these players used this older USB
17 technology, USB 1.0 technology, which had extremely slow
18 transfer rates. So, they might be okay if you had the
19 flash-based player with eight to ten songs. It wouldn't
20 take that long to transfer your music over. But if you
21 had one of these hard-drive-based players, I mean, it
22 could take hours, literally three, four hours, to
23 transfer all your music over. I mean, it was really a
24 pain.

25 And not only that, if you were spending three

1 or four hours connected up transferring, you had to worry
2 about battery life as well. So, you'd have to, you know,
3 find an AC adapter and plug it in; so, you'd have all of
4 these kind of cables running from your device and the
5 computer and the wall and everything else. It was a very
6 inelegant experience.

7 Q. So, what kind of lessons did you take away from
8 your research into the market?

9 A. Well, the market was very fragmented; and we
10 realized that, wow, if we could create something that had
11 the best of both worlds, that didn't make a customer make
12 these really tough choices, then you could have something
13 with -- if you could have something with great
14 portability and have something with just that same kind
15 of great storage that those other hard drive players had,
16 then you'd have something different. I mean, you'd have
17 something really new and innovative.

18 Q. Now, how did you coordinate your research efforts
19 with Mr. Fadell?

20 A. Mr. Fadell and I met weekly starting in February;
21 and we would share our results and, you know, see where
22 each person was.

23 Q. Did you eventually share your investigation
24 results with Apple management?

25 A. Yeah. We were tasked with really providing a

1 recommendation to Apple in terms of what we should do in
2 this portable music player market.

3 Q. And when did you do that?

4 A. It was in the early April time frame that we did
5 that.

6 Q. And did you make any recommendations?

7 A. Yeah. I mean, we had looked at a couple different
8 ways to do this, should we be looking at flash memory,
9 should we be looking at, you know, other memory types,
10 removable media, all those kinds of things. And we
11 recommended to Apple and to management that we go ahead
12 and try to create something using this smaller Toshiba
13 hard drive because it allowed us to combine the best of
14 both worlds.

15 Q. And did management accept your recommendation?

16 A. Yeah. They told us to move forward.

17 Q. Now, when management said to go ahead, did the
18 project become public? Was there an announcement or
19 anything like that?

20 A. No. No. We -- after that meeting we still kept
21 it incredibly top-secret. Only a handful of people at
22 Apple even knew that we were working on this.

23 Q. Did you have a timeline for that product?

24 A. Yeah. We wanted to get that product out before
25 the 2001 holiday season. We realized that a lot of these

1 products, these music players and consumer electronics
2 products, they all sold a lot better during the holiday
3 quarter because a lot of people would buy them as gifts
4 as well.

5 Q. Was that a challenging schedule?

6 A. Oh, yeah. I mean, that was just seven, eight
7 months away until the holiday season; and that was -- it
8 looked like a big challenge.

9 Q. And how did you overcome those challenges?

10 A. Well, the first thing to do was really to hire a
11 team. It was really only Mr. Fadell and myself; so,
12 there was really only two people. I mean, we couldn't do
13 this by ourselves.

14 And, so, one of the things that --
15 Mr. Fadell's main task right after that was to try to
16 build a team. And, you know, of course you can hire
17 people from the outside; but that takes a little bit of
18 time. And, so, he really went to all the different
19 groups at Apple to kind of beg and borrow people to try
20 to help out on this project. I mean, in some ways it was
21 kind of nice that you had Apple as this, you know, bigger
22 company that had these resources. But he had to
23 basically go to every group and say, "Hey, you know, I
24 need help with this project; and I can't even tell you
25 what we're working on." So, it was quite a challenge to

1 try to get people to lend them their people to come over
2 and help us.

3 Q. Did the work that you were doing, Mr. Ng, change
4 after the management go-ahead?

5 A. Yeah. I mean, right after that go-ahead, my role
6 really started to focus on creating the requirements, the
7 market requirements document for the engineering team.

8 Q. Let's take a look at that.

9 MR. STEPHENS: If we could have Defendant's
10 Exhibit 42 up.

11 BY MR. STEPHENS:

12 Q. And, Mr. Ng, there is a copy of Defendant's
13 Exhibit 42 in your binder -- oh, I'm sorry. We didn't
14 hand those out.

15 MR. STEPHENS: May we approach, your Honor?

16 THE COURT: You may.

17 BY MR. STEPHENS:

18 Q. Defendant's Exhibit 42, Mr. Ng, if you could turn
19 to that tab in your binder.

20 A. Okay.

21 Q. Do you have that?

22 A. I do.

23 Q. Do you recognize that?

24 A. I do.

25 Q. What is it?

1 A. This is the marketing requirements document that I
2 wrote.

3 Q. And when did you create it?

4 A. Probably in the April to May time frame.

5 Q. And what's the purpose of this document?

6 A. Well, the purpose of this document is really to be
7 kind of a blueprint to our engineering team, really to
8 outline and define what the product should be.

9 MR. STEPHENS: If we could turn to page 4,
10 please.

11 BY MR. STEPHENS:

12 Q. Near the top there it says "iTunes to Go." Do you
13 see that?

14 A. Yes, I see that.

15 Q. "Dulcimer is *iTunes* to Go," what did you mean by
16 that?

17 A. Well, kind of as we had talked about before, when
18 we were thinking about this, kind of the goal from the
19 very beginning was that we had *iTunes* on your Macintosh
20 computer but there was no good way to really take it with
21 you wherever you want it and, so, the goal was always to
22 make this product kind of a representation of *iTunes* on
23 the go.

24 Q. Now, there's a section right after that called
25 "Market Overview." What's that about?

1 A. Well, this was really a -- you know, after all of
2 my investigation and research -- an overview of kind of
3 the landscape of the market, what was going on in the
4 market. And some of that I talked about before, kind of
5 there were flash-based players and hard-disk-drive
6 players and really what was going on in the market so
7 that engineering, as they were looking at building this
8 product, they would understand, you know, kind of where
9 we could do even better than what was already available
10 in the market.

11 Q. Did you identify the kinds of strengths and
12 weaknesses you mentioned before?

13 A. Yeah. No, definitely. I really outlined kind of
14 some of the challenges to the current players that were
15 existing out there and what we could do better.

16 MR. STEPHENS: And if we could turn to page 6,
17 please. There is this section there called "Product
18 Vision."

19 A. Yes.

20 BY MR. STEPHENS:

21 Q. Could you explain that?

22 A. Well, this is, as I mentioned, what I believed to
23 be the goals and how we could make the product better
24 than what was already existing there in the market.

25 Q. And was this driven in part by your market

1 research?

2 A. Yes, it was.

3 Q. Now, the next page of Defendant's Exhibit 42,
4 page 7, has a "Product Description" with a table below
5 it.

6 A. Yes.

7 Q. What's that?

8 A. Well, this is a more specific description of kind
9 of the nitty-gritty of the product, like what's really
10 going to be in it and what it should support and the
11 features that should be there.

12 Q. Now, was the iPod ultimately built in accordance
13 with your marketing vision?

14 A. The vision? Yes, I believe so.

15 Q. What about these specific product descriptions?

16 A. Pretty close. I mean, there were a couple things
17 that we didn't get to which we got to in further
18 generations of the product.

19 Q. After you finished the marketing requirements
20 document in Defendant's Exhibit 42, what did you do next?

21 A. Well, after creating this blueprint for our
22 engineering team and they were off, you know, trying to
23 figure out how to build it and moving along, the next
24 phase of my role was to really figure out how we were
25 going to communicate the product to customers who might

1 be willing to buy it. And, so, really taking the
2 features and the benefits of the product and forming them
3 into messages and how we would talk about it.

4 MR. STEPHENS: Could I have Defendant's
5 Exhibit 53, please?

6 BY MR. STEPHENS:

7 Q. Do you have that, Mr. Ng?

8 A. I do.

9 Q. What is Defendant's Exhibit 53?

10 A. This is the Product Brief that I originally wrote
11 to deliver to our marketing communications, our P.R., and
12 our launch teams.

13 Q. Did I understand it right that the Hardware
14 Product Brief was for the marketing people and the
15 marketing requirements document was for the engineering
16 people?

17 A. Yeah. Seems kind of backward; but, yeah, that is
18 the case.

19 Q. Okay. What was the purpose -- I'm sorry. When
20 did you create the P68 Hardware Product Brief that we see
21 in Defendant's Exhibit 53?

22 A. This was created in July of 2001.

23 MR. STEPHENS: If we could turn to page 9.

24 BY MR. STEPHENS:

25 Q. Near the top of the page, there is a discussion of

1 a bunch of factors; and it talks about technical
2 mumbo-jumbo and the like. Could you explain that for us,
3 please?

4 A. Well, when I was looking at how other people were
5 talking about their portable music players, they really
6 were marketing their product like computers. I mean, it
7 was all this technical specs and feeds and all sorts of
8 numbers and stuff; and it was really complicated actually
9 for customers at that time. I mean, they didn't care
10 about that stuff. I mean, there was just a couple of
11 really simple questions I believed that someone was
12 asking about when they were looking to buy a portable
13 music player in this space.

14 Q. And are those questions shown in this document
15 just below where we were looking at?

16 A. Yes, they are.

17 Q. And what kind of questions were those?

18 A. Well, I mean, it was pretty simple. I mean, you
19 really cared about how much music you could hold on this
20 because, as I mentioned before, it was such a pain to go
21 back and change it out if it only held, you know, eight
22 or ten songs.

23 You'd care about, you know, the battery life,
24 you know, how long can I actually play.

25 You'd care about how big the thing is, you

1 know, how heavy it is.

2 And, of course, you'd care about how much it
3 costs.

4 Q. Mr. Ng, just below this section we're looking at
5 now, there is a section called "Key Messages." Did you
6 identify some key messages for the iPod?

7 A. Yes, I did.

8 Q. What were those?

9 A. Well, we really looked at some of the things we
10 thought were important for the product. And, again, to
11 differentiate it from the other products out there.

12 And what we saw were these four things that we
13 thought we could do to make this different than
14 everything else out there. You know, "Holds all your
15 music, truly portable and pocket-sized, best sound
16 quality, and integrates seamlessly with your Mac."

17 Q. Now, were those key messages related to the
18 customer questions that you had observed?

19 A. Oh, definitely.

20 Q. In what way?

21 A. Well, we wanted to address those concerns that
22 customers might have. So, if they walked into a store,
23 that we would be able to answer those questions that we
24 thought were driving what someone was thinking about in
25 buying an MP3 player.

1 Q. Now, just below the section that we're looking at
2 now, "Key Messages," there is a portion there, 3.2,
3 "Detailed Product Messaging." And the first section is
4 "Holds all your music." That's one of the key messages
5 you mentioned, right?

6 A. Yes.

7 Q. Could you explain that key message a bit more?

8 A. Well, we saw the challenges with those flash-based
9 players, again, you know, only holding eight, ten songs
10 at a time. And, so, one of the ways to address, you
11 know, a customer's frustration or, you know, decision in
12 buying that was saying, "Hey, you know, we could hold all
13 your music. We could hold just an incredible amount of
14 music you could take with you on the go." And the way we
15 would accomplish that was with that new Toshiba hard
16 drive and also integrating this scroll wheel that we
17 integrated into the iPod to make it very easy for you to
18 access your music.

19 Q. On the next page, Mr. Ng, page 10 of Defendant's
20 Exhibit 53, there is another section, "Truly portable -
21 Pocket-sized." Was that another one of your key
22 messages?

23 A. Definitely. This idea of portability was so key
24 because those other hard-drive-based players were large
25 and clunky. So, really differentiating saying, "Hey, you

1 can carry all your music with you in something that was
2 pocket-sized." That combination was what was so
3 powerful. So, we wanted to make sure that this thing was
4 the smallest thing that was available for
5 hard-drive-based players.

6 Q. And how did Apple deliver on that?

7 A. Well, we made this product incredibly small. It
8 was, you know, about the size of a deck of cards. And it
9 was something that you could put in your pocket and bring
10 with you everywhere; and, you know, we even, you know,
11 put in shock protection because we knew people might go
12 running with them.

13 Q. Mr. Ng, the next section on that page is "Best
14 sound quality." Do you see that?

15 A. Uh-huh.

16 Q. Is that another one of your key messages?

17 A. Yes.

18 Q. Could you explain that, please?

19 A. Well, the products that we had looked at, these
20 competitive MP3 players out there, surprisingly they --
21 they were music players, but they had really poor sound
22 that came out of them. And when we looked at them, we
23 realized that a lot of these people were, you know, just
24 taking off-the-shelf parts and slapping them in their
25 players. And -- you know, like the headphone jack or the

1 headphones they included with them or the amplifier that
2 they had inside. I mean, they really just pulled stuff
3 together and built it like that.

4 And we said, "You know what? That doesn't
5 make sense. We want to have a great-sounding music
6 player because music is the key thing about the product."
7 And, so, we -- we didn't do that. We didn't just take
8 off-the-shelf parts. We went to our suppliers and our
9 manufacturers and said, "Hey, you need to build us
10 something different or unique. You need to make
11 something for us that is higher quality. And we're
12 willing to pay for it. You know, we're willing to pay
13 for this higher quality and put it in our products."

14 And, so, an example of that is, you know, the
15 headphones. We even included it in the box. I mean,
16 we -- for the first time in that kind of consumer space,
17 we included these really high-end neodymium magnets in
18 our headphones which make the sound quality that much
19 better. And that wasn't cheap, but we were willing to
20 spend on it because this was a music player.

21 Q. Mr. Ng, if we could go now to Defendant's
22 Exhibit 53, page 11. There is a section there titled
23 "Integrates seamlessly with your Mac."

24 A. Yes.

25 Q. Is that another key message?

1 A. Yes.

2 Q. Could you explain that for us, please?

3 A. Well, this idea of *iTunes* to Go was always, again,
4 a guiding principle for the product. And, so, we wanted
5 to make sure that when you connect it up to your
6 computer, this was a very easy and simple experience.
7 And I kind of alluded to earlier that other players had a
8 very compromised experience. It took forever to transfer
9 the music on. You had all this spaghetti of cables
10 everywhere, you know.

11 And, so, we decided that, wow, we're going to
12 use this newer technology called "FireWire" that allowed
13 you to transfer your music, you know, 30, 40, even a
14 hundred times faster than these other players. And also
15 the advantage of FireWire was that it could charge your
16 iPod at the same time when it was connected to the
17 computer.

18 So, with one simple cable you could plug your
19 iPod into your Mac, charge, and transfer your music from
20 *iTunes* over to your iPod at once. I mean, it was a
21 really, really nice, elegant, and seamless experience.

22 Q. Mr. Ng, I'd like you to try to take yourself back
23 to the late summer of 2001 and tell us what it was like
24 for you and your team as you worked up to the launch of
25 the iPod.

1 A. It was intense. I mean, it was -- it was crazy.
2 I mean, people were working around the clock. People
3 were, you know, always there, seven days a week. It was
4 such an intense period with people just, you know, making
5 so much sacrifice to try to get this out before the
6 holiday season.

7 Q. Did you make that deadline?

8 A. We did.

9 Q. Now, the announcement of the iPod, when did that
10 happen?

11 A. That happened October 23rd, 2001.

12 Q. Could you describe the announcement, please?

13 A. Yeah. We had -- before the 23rd, a week before,
14 we invited several hundred journalists to come to Apple's
15 headquarters in Cupertino, California, and to attend a
16 keynote presentation by Mr. Jobs on that day. And, so,
17 they came into our town hall conference or theatre and
18 they all sat down and Mr. Jobs proceeded to introduce
19 this product to them.

20 Q. What was the reaction to the announcement?

21 A. Well, for the people who were there -- and we also
22 had this hands-on room where people could come in and try
23 the products as well -- the reaction was actually really
24 positive. I remember because I was in charge of this
25 hands-on room and, you know, my job was to -- because

1 there were several hundred journalists and there was only
2 about 20 to 30 stations where we had an iMac and an iPod
3 and a stack of CDs. My job was to get them in and out
4 really quickly because we had so many journalists waiting
5 to try out the product.

6 Well, the first set of journalists come into
7 the room and, you know, there is these 20-minute blocks
8 of time that I've set aside and I've got this microphone
9 and I'm standing there kind of saying, "Oh, you know,
10 give the scroll wheel a try. Experience this." And I'm
11 looking at my watch; and I go, "Okay. 20 minutes are
12 up." And, you know, I lift the microphone. I say,
13 "Okay. Now it's time to move on, and the next group is
14 supposed to come in." And they wouldn't go. They
15 wouldn't leave. They just -- they ignored me. I don't
16 know. They were so busy using the product in their
17 hands, using the scroll wheel and just amazed that they
18 could keep this whole stack of CDs, you know, compressed
19 into this small pocket-sized device. I mean, they loved
20 it, the people who were there. They really loved it.

21 Q. Were you able to accommodate all the people who
22 wanted to use the setups that you had?

23 A. Eventually, but there were a lot of journalists
24 who couldn't make it to the event or who weren't invited
25 to the event.

1 Q. And what was the reaction of journalists that
2 didn't come to the hands-on event?

3 A. Yeah. It was -- it was somewhat disconcerting,
4 but they thought we were crazy. The reviews were really
5 negative actually. It was very black or white. If you
6 had come to the event and tried out the product, they
7 really understood it. They loved it. They got the sense
8 that it was incredibly portable and held all your music.

9 But if you were from afar, a journalist
10 looking at, you know, what we had introduced and reading
11 about it, you thought Apple was crazy for introducing
12 this 400-dollar music player, this frivolous thing at
13 \$400, when, you know, Apple was starting to make strides
14 with the iMac and growing its Mac business and, "Hey,
15 Apple, what are you doing? You should be focusing on the
16 Mac and not doing this frivolous 400-dollar music
17 player." So, we got really negative reviews at that time
18 from people who were not able to get their hands on the
19 product.

20 Q. When did Apple actually start selling the iPod?

21 A. That was November 10th. We had them in stores.

22 Q. And what was the consumer response once you
23 started selling them?

24 A. Well, thankfully, the consumer response was good,
25 despite some of those negative reviews. People loved the

1 product.

2 Q. Did you make any initial sales forecasts before
3 the launch?

4 A. Yeah, I did.

5 Q. Let's take a look at Defendant's Exhibit 42 again,
6 page 9 this time. About halfway down the page there,
7 there is a table that says "Worldwide Preliminary
8 Forecast."

9 A. Yes, I see that.

10 Q. Was that your forecast?

11 A. Yeah, it was, I'm kind of ashamed to say. But,
12 yeah, it was.

13 Q. How did actual sales shape up compared to your
14 forecast?

15 A. Much better than that in that first quarter, that
16 Q1 '02, which I had forecast 35,000 units as kind of that
17 holiday quarter. We actually sold over 130,000 units.

18 Q. Is the iPod still popular today?

19 A. Yes. It's very popular.

20 Q. Now, has Apple changed the iPod over time?

21 A. Oh, yeah, many, many times. Added new product
22 lines to the family, really added a lot of innovation to
23 it over time.

24 MR. STEPHENS: Could we have DDX 207, please?

25 *

1 BY MR. STEPHENS:

2 Q. And there should be a copy at the back of your
3 binder, Mr. Ng.

4 Could you just kind of take us through the
5 various lines there? Start by explaining the three
6 different lines across the table we see.

7 A. Sure. These are -- on the bottom is what we now
8 call the "iPod classic," but really the original iPod
9 that started it all and all of the generations of those.

10 Then in the middle you'll see the iPod mini
11 which we had introduced.

12 And then following that, the replacement to
13 the iPod mini on top there, the iPod nano.

14 Q. What's the difference between those three product
15 lines?

16 A. Well, the iPod line, our iPod classic line, was
17 really about just -- again, it was what started it all
18 and really continued to have the greatest amount of
19 storage possible for you in that small form factor.

20 The mini and the nano, we realized that not
21 everyone could afford the iPod. It was more expensive.
22 And, so, we wanted to create something that was a little
23 bit less expensive and also had more of a youth and
24 female appeal. And, so, we added colors to the iPod mini
25 and eventually the iPod nano and really got more of a

1 younger and more female demographic.

2 Q. Let's go back now to the iPod classic line along
3 the bottom. Could you explain to us how that line
4 changed over time?

5 A. Yeah. I mean, we made a lot of changes. I mean,
6 in the second generation we changed from that mechanical
7 scroll wheel to a touch wheel. We added more languages
8 because the original first generation only supported
9 four.

10 We made it available so that it worked with a
11 PC in that time frame as well. So, that was a big change
12 there.

13 In the third generation we made it
14 significantly thinner. We went to all touch buttons and
15 wheel.

16 In the fourth generation we added a color
17 display, a color screen, and the ability to view your
18 photos.

19 Fifth generation, an even bigger color display
20 and the ability to play back video as well as to play
21 games on it.

22 And sixth generation, you know, we got all the
23 way up to 160 gigabytes of storage, so the ability to
24 carry, you know, tens of thousands of songs, hundreds of
25 hours of video, tens of thousands of photos, really carry

1 everything with you on the go.

2 Q. And how did the mini product line change over
3 time?

4 A. The mini, when we introduced it, was, again, very
5 different than the iPod, had colors, was smaller, was
6 even easier to exercise with. It added a lower price
7 point at the time as we got from first to second
8 generation. And that's really what we did with the mini.

9 Q. And how about the nano?

10 A. Well, the nano was a complete replacement for the
11 iPod mini. In fact, a lot of people thought we were
12 crazy for replacing that very popular iPod mini. But the
13 nano was our first product to finally use flash-based
14 memory because it was finally cheap enough to get, you
15 know, some decent amount of storage in there. And by
16 using that, we were able to make the nano half the size
17 of the iPod mini; so, it was that much smaller. So, the
18 nano changed over time as well by adding colors, color
19 screens, again photos and videos; and even up to the
20 fifth generation we added a camera in it as well so you
21 could capture video.

22 Q. Mr. Ng, I think you said your current job title is
23 senior director of worldwide product marketing. Did I
24 get that right?

25 A. That is correct.

1 Q. What's your role?

2 A. Well, my role is to, again, be the voice of the
3 customer, to provide those requirements and understand
4 the market for both the iPod and iPhone at this time.

5 Q. Do you use any surveys in that job?

6 A. Yes, we do.

7 MR. STEPHENS: Could we take a look at
8 Defendant's Exhibit 275?

9 BY MR. STEPHENS:

10 Q. Could you tell us what that is?

11 A. This was an iPod customer survey that we conducted
12 in, looks like, November of 2003.

13 MR. STEPHENS: If we could turn to page 1.

14 BY MR. STEPHENS:

15 Q. What were the objectives of this survey?

16 A. Well, a number of things we wanted to find out,
17 you know, just how important certain product features
18 that we had put in were, how satisfied people were with
19 the product, and what they used it for and why they
20 purchased.

21 MR. STEPHENS: If we could turn to page 3.

22 BY MR. STEPHENS:

23 Q. What does the report indicate as the most
24 important product features?

25 A. Well, definitely the most important product

1 features were sound quality, ease of use, the size of the
2 product, and the storage capability of the product or how
3 many songs that you could store on the iPod.

4 MR. STEPHENS: If we could turn to page 11,
5 please.

6 BY MR. STEPHENS:

7 Q. Do you have that?

8 A. I have that, yeah.

9 MR. STEPHENS: It's Defendant's Exhibit 275,
10 page 11.

11 BY MR. STEPHENS:

12 Q. Near the bottom there is a section, "Main Reason
13 For Purchase." Do you see that?

14 A. I see that.

15 Q. What is the main reason for purchasing an iPod?

16 A. The main reason people buy it is because of how
17 many songs you can carry with you, the design and how the
18 size of the product is. All of that is just really vital
19 to why people buy it.

20 THE COURT: All right. Counsel, we're going
21 to take a break.

22 Ladies and gentlemen, I'll ask you to be back
23 at quarter of.

24 (The jury exits the courtroom, 9:31 a.m.)

25 THE COURT: We'll be in recess until quarter

1 of.

2 (Recess, 9:32 a.m. to 9:45 a.m.)

3 (Open court, all parties present, jury
4 present.)

5 THE COURT: Please continue, Mr. Stephens.

6 MR. STEPHENS: Thank you, your Honor.

7 BY MR. STEPHENS:

8 Q. Mr. Ng, after the iPod was announced, were you
9 finally able to tell your wife what you'd been working on
10 all those months?

11 A. Yeah. I finally was able to tell her.

12 Q. How do you feel about the iPod?

13 A. I'm proud to have been a part of it. I feel like
14 I grew up while I was working on iPod, that, you know, in
15 my 20s it was such an amazing opportunity to work on
16 something new and innovative and immensely proud of the
17 sacrifices that the team made, that I made, that my wife
18 made, our families made. So, I'm incredibly proud of
19 what we've done.

20 Q. Thank you, Mr. Ng.

21 MR. STEPHENS: Pass the witness.

22 MR. SCHUTZ: May I approach the witness, your
23 Honor?

24 THE COURT: You may.

25 MR. SCHUTZ: Thank you.

1 Mr. Ng, a book for you.

2 THE WITNESS: Thank you.

3 MR. SCHUTZ: You're welcome.

4 CROSS-EXAMINATION OF STAN NG

5 BY MR. SCHUTZ:

6 Q. Good morning, Mr. Ng.

7 A. Good morning, sir.

8 Q. You and I have never met, have we?

9 A. I don't believe so.

10 Q. Okay. Now, you are not here to testify that Apple
11 does not infringe the Personal Audio patents, right?

12 A. I'm not sure actually.

13 Q. Oh, okay. Well, let me ask you this -- I put a
14 binder up there; and in that binder in the first tab,
15 there is an exhibit there. It's one of the two patents
16 that Apple is accused of infringing in this case. Do you
17 see that? It's Tab 1 on the thick binder.

18 A. Plaintiff's Exhibit 1, sir?

19 Q. Plaintiff's Exhibit 1, yes.

20 A. Yes. I've opened it to that.

21 Q. And then I've also got in there Plaintiff's
22 Exhibit 2. Plaintiff's Exhibit 1 is what we've referred
23 to as the "'076 patent," and Plaintiff's Exhibit 2 is
24 what we've referred to as the "'178 patent." Do you see
25 those?

1 A. I see those.

2 Q. And you are not here to testify that Apple does
3 not infringe those patents, right, sir?

4 A. Actually, I don't know; but I trust you.

5 Q. Okay. Nobody's told you that?

6 A. No one has told me one way or the other.

7 Q. All right. And you're not here claiming that
8 these patents are invalid, right?

9 A. I've never seen these patents before.

10 Q. Great. And, so, how long have you known this suit
11 has been on?

12 A. Maybe a year and a half.

13 Q. A year and a half. And I did not take your
14 deposition in this case; but one of my colleagues did,
15 correct?

16 A. That is correct.

17 Q. And, so, you've known for at least a year and a
18 half that Personal Audio had charged Apple with
19 infringing some patents, right?

20 A. Yes.

21 Q. And you've never even looked at the two patents
22 that Apple has been charged with infringing?

23 A. No.

24 Q. No curiosity at all as to what's in those patents?

25 A. No. I actually get called for these kind of

1 document retentions and depositions quite often actually.

2 Q. All right. Now, how long have you known that you
3 were going to testify as a witness in this case?

4 A. I don't recall.

5 Q. A month? Two months?

6 A. I don't recall the exact time that I was told that
7 I would be a witness in this case.

8 Q. It's been at least a couple months, right?

9 A. I don't recall.

10 Q. And -- but at some point you were told you were
11 going to be a witness?

12 A. At some point I was told that I would be a witness
13 to this case.

14 Q. And you knew the case was about Apple infringing
15 these two patents, right?

16 A. I knew that there was some sort of infringement as
17 part of this. That is correct.

18 Q. And even out of curiosity, you never bothered
19 looking at the patents?

20 A. Nope.

21 Q. Let's go back to the iPod development.

22 A. Okay.

23 Q. And we're not here claiming the iPod is a bad
24 product. I mean, we think the iPod is a great product.
25 It's about other issues.

1 But when you were developing the iPod, you had
2 a lot of time pressure, right?

3 A. Yes, we did.

4 Q. You started on this project in February, 2001?

5 A. That is correct.

6 Q. Tried to meet the Christmas buying season, right?

7 A. Yes.

8 Q. And that usually starts at around Thanksgiving, a
9 little earlier than that, right?

10 A. That is correct.

11 Q. And, so, there's a lot of work that needs to be
12 done in terms of your supply chain and getting
13 everything. It's not just, you know, developing the
14 product. Then you've got to worry about getting it
15 manufactured, boxed, shipped, and ready to distribute,
16 right?

17 A. Yes. There is a lot involved in creating a
18 product.

19 Q. And, of course, all the manufacturing was done in
20 Asia, right?

21 A. Yes.

22 Q. With a lot of Asian component suppliers, right?

23 A. That is correct.

24 Q. And you worked very hard. You were under time
25 pressure. Did you cut any corners in this project?

1 A. We decided to not do some features that we had
2 originally planned.

3 Q. Okay. Now, you were asked on direct examination
4 whether you'd ever heard of Mr. Logan or Mr. Call or
5 Mr. Goessling, right?

6 A. Yes, I was asked that.

7 Q. And you said you had not.

8 You were also asked if you had ever seen the
9 Personal Audio patents, right?

10 A. That is correct.

11 Q. Did you guys ever look when you were developing
12 the product?

13 A. I'm sorry? Can you repeat the question?

14 Q. Did you ever look to see if people had patents
15 that you might need to be concerned about when you were
16 developing this project?

17 A. I personally did not look.

18 Q. Just so we understand, there have been a lot of
19 timelines flashed up here; and I want to make sure that
20 we, you know, have some perspective on some of these
21 timelines. This is Plaintiff's Exhibit 1, the
22 '076 patent. And just so we have some reference on
23 timelines and the like, this patent issued in March of
24 2001. Do you see that?

25 A. I see that date.

1 Q. Which is just shortly after you and Mr. Fadell
2 started working on this iPod project, right?

3 A. That is correct.

4 Q. Did you and Mr. Fadell ever have a discussion
5 about, "Hey, you know, we're going ahead with this
6 project. Should we see if anybody has any patents on
7 it?"

8 A. Not that I can recall.

9 Q. Because Apple gets patents on stuff, right?

10 A. Yes, Apple has patents on things.

11 Q. And Apple sues people for patent infringement from
12 time to time, right?

13 A. That, I wouldn't know.

14 Q. Mr. Ng, are you still -- you're still involved
15 with iPod sales, right?

16 A. I'm involved in iPod product marketing, yes.

17 Q. All right. And, so, you've been involved from the
18 beginning on iPod product marketing, right?

19 A. That is correct.

20 Q. And you've been involved in dealing with the
21 customer, as I understand you said, right?

22 A. Yes. I've dealt with the customer.

23 Q. What customers want, what they don't want. I
24 mean, your job is to give the customer a product that
25 they want to buy, right?

1 A. My job is, yes, to be the voice of the customer
2 within Apple.

3 Q. And you also want to provide a product that will
4 beat the competitors in the marketplace, right?

5 A. Definitely to create a product that's innovative
6 and is very competitive.

7 Q. And when you were working on the iPod project, you
8 went out and found -- and researched as many products as
9 you could from your competitors to see what everybody
10 else was doing, right?

11 A. That is correct.

12 Q. And is it fair to say that that certainly helped
13 you guys move this iPod project along in a fast time
14 frame?

15 A. I don't think that me purchasing those products
16 accelerated our path to developing or producing the iPod.

17 Q. So, that was a waste of time?

18 A. No. That just helped guide some of the
19 requirements that I put together.

20 Q. So, it was helpful?

21 A. It was helpful to me to create the requirements,
22 yes, sir.

23 Q. And the requirements drove the product, right?

24 A. The requirements drove the definition of the
25 product; but the manufacturing and the technical part of

1 it, yeah, that's a whole nother thing.

2 Q. You did not have to start from scratch, did you?

3 A. I'm sorry? What --

4 Q. You did not have to start this project from
5 scratch, with nothing, right?

6 A. Well, definitely not. I mean, portable music
7 players have been around for decades. So, even tape
8 Walkmans or portable CD players, we definitely got a lot
9 of guidance from those guys, yeah.

10 Q. From CD players.

11 A. From portable music players out there.

12 Q. Let's talk about CD players. So, what kind of
13 guidance did you get from CD players?

14 A. Well, portable CD players, again, they only held a
15 certain amount of songs because they used, obviously, CDs
16 which held maybe 14 songs.

17 Q. Well, actually they didn't hold any songs. You
18 had to take a CD; and you had to insert it in there,
19 right?

20 A. That is true, sir. You had to put a CD in there.

21 Q. You could not hook a CD player up to your computer
22 and download navigable playlists, could you?

23 A. No. I mean, they did have some MP3 CD players
24 that were starting to emerge at the time where you could
25 burn an MP3 CD; but you still ran into the same problems.

1 You had limited amount of space that you could put on
2 those MP3 CDs as well.

3 Q. And, in fact, the whole MP3 marketplace didn't
4 start developing until the late Nineties, right? The
5 first MP3 player came out about 1998, right?

6 A. To my recollection, yes.

7 Q. Yeah. Two years after Mr. Logan and his
8 colleagues went to the Patent Office, right?

9 A. I don't know when they went to the Patent Office.

10 Q. Well, right up here (indicating), it says
11 "Filed: October 2, 1996." See that date?

12 A. Okay. I see that date.

13 Q. You can take that as a given in this case, that
14 they went to the Patent Office in October, 1996.

15 A. Okay.

16 Q. So, a couple years after they went to the Patent
17 Office, somebody came out with a commercial MP3 player,
18 right?

19 A. I believe so.

20 Q. And you've been involved in looking at what
21 customers want, what the competition is doing and -- have
22 you had a role in deciding what features make it onto the
23 iPod and what don't make it onto the iPod?

24 A. Yeah. We definitely provide guidance to
25 engineering in terms of our -- you know, what we believe

1 is the right thing to do.

2 Q. And there have been a number of generations of
3 iPods, right?

4 A. There have been.

5 Q. And each time you do a next generation of iPod, do
6 you sit down and ask, "Should we add some features, take
7 some features off, leave it as it is?" Do you go through
8 that kind of exercise?

9 A. Not often take features away. Most often what are
10 we going to add.

11 Q. Have you ever taken features away?

12 A. I don't recall. I know we've added a ton of
13 stuff.

14 Q. I agree with you.

15 A. Yeah.

16 Q. You have added a lot of stuff.

17 A. Yeah.

18 Q. Some really good, neat stuff that you guys have
19 added. But from the beginning, the products have always
20 had the capability to download playlists, right?

21 A. Well, we transferred everything over from *iTunes*
22 over to the iPod so --

23 Q. Yeah. You would hook the iPod up to a computer --

24 A. To a Mac, yes. Yeah.

25 Q. -- that had *iTunes* on it. And then what would get

1 put on the iPod are music and playlists, right?

2 A. Yeah. So, I connect an iPod up to my Mac; and the
3 *iTunes* would transfer over whatever was in your library
4 over to the iPod.

5 Q. And you built into the functionality of the iPod
6 the ability to do that, right?

7 A. Well, the iPod was just kind of like a dumb hard
8 drive. I mean, it just showed up on your desktop, you
9 know, very much like a hard drive. And, in fact, that
10 was one of the key selling points as well. You could
11 actually use it to store your data like a hard drive.

12 But in any case, because it was a hard drive,
13 *iTunes* in your computer just basically transferred over
14 the stuff from your *iTunes* library.

15 Q. Right. So, again -- and I didn't think this was a
16 hard question. But you hook the iPod up --

17 A. Uh-huh.

18 Q. -- and the computer transfers -- and "download" is
19 a -- that's the term that was used in the press release
20 announcing the product, right?

21 A. (Pausing.)

22 Q. Let's take a look at that. Let's just make sure
23 that we're on the same quote here. Let me find that.

24 That's, I think -- it's in your book. I think it's
25 Plaintiff's Exhibit 377. Okay? See if you can find

1 that.

2 A. I've found it, sir.

3 Q. All right. Now, this is a press release that
4 Apple put out with the launch of the product, right?

5 A. I believe so.

6 Q. And up to this point, it had been kept in secret,
7 correct?

8 A. To the public, yes.

9 Q. To the public.

10 A. Yes.

11 Q. Did you have anything to do with this press
12 release?

13 A. I did not write this, no.

14 Q. But this is an official Apple press release,
15 right?

16 A. Yes. I believe this was written by our P.R. team.
17 Let me see if there is an author to it.

18 And there are some contacts on the next page,
19 I believe, which probably were the individuals
20 responsible for this document.

21 Q. And Mr. Jobs is, in fact, quoted in this press
22 release, isn't he? If you look, I think it's the second
23 paragraph.

24 A. I see that.

25 Q. Yeah. And he's the boss, right, or was the boss

1 at the time?

2 A. Yes. He is the CEO.

3 Q. Would it be fair to assume that he knew what the
4 company was announcing to the public?

5 A. Yes.

6 Q. And, in fact, he's the guy who ran the
7 announcement, wasn't he, in the big Apple theatre, right?

8 A. He presented the keynote, yes.

9 Q. Right. And, so, the first thing that -- this is
10 the first written communication to the consumer public
11 about the iPod, right?

12 A. It probably was coincidental with our Web pages
13 and all our other communications, but this was one of the
14 initial communications that went out to the public.

15 Q. All right. And, so, when you told the public what
16 the iPod could do, you said it "automatically downloads
17 all your *iTunes* songs and playlists onto your iPod,"
18 right?

19 A. I see that in the press release, yes.

20 Q. Have you ever thought about taking out the ability
21 to download playlists onto the iPod and say, "We don't
22 need that. Let's just take that off"?

23 A. No, I don't think so. I mean, I think the only
24 reason we'd consider removing that kind of capability
25 would be if *iTunes* removed that capability.

1 Q. So, now, there's another way to -- there is an
2 option where you could remove that capability from the
3 iPod and still sell an iPod, right?

4 A. I'm sorry? Repeat that, please, sir.

5 Q. I mean, one thing that you could do is you could
6 download just the songs and no playlists, right?

7 A. Yeah. You can do that today. You don't have to
8 have playlists in your *iTunes* library.

9 Q. Exactly. Exactly.

10 And you could have it so that the only way a
11 user could create playlists would be directly on the
12 iPod. So, they wouldn't download playlists. They'd just
13 download music; and then once they got the music on the
14 iPod, then they could create playlists on the iPod
15 itself. You could technically do that, right?

16 A. Not at this time. Not in 2001.

17 Q. No, no, no, no, no, no. I'm talking about -- this
18 case involves -- well, you couldn't do that in 2001.

19 A. No. No.

20 Q. But at some point you added that functionality,
21 right?

22 A. Yeah. I don't remember when, but there was an
23 addition later on.

24 Q. So, some of those iPods up there have the ability
25 to actually create a playlist on the device itself?

1 A. I don't know if it was create a playlist. There
2 was an existing playlist that was there that you could --
3 I think it was called "On-The-Go," which you could add
4 songs to.

5 Q. But you can't create a playlist directly on iPod
6 itself?

7 A. I think they were pre-created, On-The-Go
8 Playlist 1 or On-The-Go Playlist 2. I don't think you
9 could actually name them.

10 Q. But what if I'm gone and away from my computer but
11 I've got the thousand songs in my pocket on my iPod and
12 my computer is nowhere to be seen but what I want to do
13 is I want to have five or six songs I want to listen to
14 when I go on a run. Can I create them on the iPod
15 itself? Any of these iPods, any of the ones you've
16 talked about.

17 A. So, you could add some songs to that On-The-Go
18 playlist.

19 Q. So, you could only add. You can't independently
20 create a playlist on the iPod?

21 A. I don't think that's the way it worked; but --

22 Q. Okay.

23 A. -- again, I'm not sure.

24 Q. Okay.

25 A. Yeah.

1 Q. So, here's some additional functionality. Once
2 those playlists are downloaded, they're navigable. I
3 mean, you can move around them. You can skip ahead. You
4 can skip back, right?

5 A. Meaning in the playlists, you can go to the next
6 song in a playlist?

7 Q. Or to the previous song.

8 A. Or to the previous song?

9 Q. That's what I mean.

10 A. Yes, you can move from one song to another.

11 Q. Have you thought about taking that off and saying,
12 "Just push the 'play' button, and it will play from 1 to
13 10 or whatever. We don't need this skip-around
14 function"?

15 A. No. I don't think we ever considered removing
16 that.

17 Q. The iPod line -- and let's talk about some of the
18 recent ones -- have a lot of features and a lot of
19 functionality, right?

20 A. That is correct.

21 Q. So, if Mr. Jobs came to you and said, "Mr. Ng, I
22 want to remove some of the features on here. The device
23 is too complicated," give me the first feature you'd tell
24 him that should be taken off, or the first functionality.

25 A. I'd probably say alarms.

1 Q. Then he says, "I want another one. Give me a
2 second one."

3 A. Maybe calendar.

4 Q. Give me a third one.

5 A. Maybe contacts.

6 Q. Fourth one.

7 A. Maybe the ability to reorganize the menu.

8 Q. Fifth one.

9 A. Let's see. Probably games.

10 Q. Sixth one.

11 A. I don't know. It's getting tougher. People use
12 their iPod for so many different things.

13 Q. Well, take off something that's not worth
14 anything.

15 A. I'm sorry. Something not working?

16 Q. No, not worth anything, some feature that really
17 has no value. There must be some more.

18 A. That's why it's hard, because they all have value,
19 right? I mean, it's hard to say what one person will use
20 every time you remove a feature, which is why we never
21 really consider that much, to remove a feature. Removing
22 a feature means that some people are going to be unhappy,
23 right? And, so, you know, that's really, really a tough
24 choice because, you know, even something like alarms, you
25 know, a small number of people will use them, but they'll

1 be really unhappy when you remove it.

2 They're all important. I mean, all features
3 are important. Let's see. What else would I remove?
4 Maybe the ability to use it as a hard drive, I guess.
5 That would be a really tough one to remove, too, but --
6 yeah.

7 Q. Thank you, Mr. Ng.

8 MR. SCHUTZ: Pass the witness.

9 MR. STEPHENS: Just a few questions, your
10 Honor.

11 REDIRECT EXAMINATION OF STAN NG

12 BY MR. STEPHENS:

13 Q. Mr. Ng, is it your job to look for patents?

14 A. No.

15 Q. Did Apple have a legal department back in 2001?

16 A. Yeah, we do -- or we did.

17 Q. Did you have other things to do at the time?

18 A. Oh, yeah. I had a lot. As I mentioned before,
19 my -- it was crazy back then.

20 Q. Do you still have other things to do today?

21 A. Yeah, even more so than before, unfortunately.

22 Q. Now, you mentioned that you could use an iPod
23 without playlists, right?

24 A. That is correct.

25 Q. Do people actually use iPods without ever using

1 playlists?

2 A. I don't know. Maybe.

3 Q. Thank you.

4 A. Okay.

5 THE COURT: You may step down, sir.

6 Who's the next witness?

7 MR. CORDELL: Your Honor, defendants will now
8 call Mr. Jesse Boettcher.

9 THE COURT: Do you want to go ahead and bring
10 up the books with him and so forth?

11 Okay. Sir, if you'll step up and be sworn.

12 (The oath is administered.)

13 MR. CORDELL: Your Honor, may I have a brief
14 interim statement?

15 THE COURT: You may.

16 MR. CORDELL: Ladies and gentlemen, you're now
17 going to hear from Mr. Jesse Boettcher who is one of the
18 engineers that works at Apple. Mr. Boettcher is a
19 software engineer, and he and I are going to do our best,
20 but I will tell you in advance this is going to be a
21 little complicated. He's going to tell you how the iPod
22 works on the inside. He can open up the hood and he can
23 take it apart and he can show you exactly the way that
24 works.

25 So, with that, we'll get started. Thank you.

DIRECT EXAMINATION OF JESSE BOETTCHER

CALLED ON BEHALF OF THE DEFENDANT

BY MR. CORDELL:

Q. Good morning, Mr. Boettcher.

A. Good morning.

Q. Can you please introduce yourself to the ladies and gentlemen on the jury?

A. Sure. My name is Jesse Boettcher. I grew up in Milwaukee, Wisconsin; and now I live in San Jose.

Q. Are you married?

A. I am. Been married almost six years now, and we have two little boys. One of them is 3 and a half; the other one is almost 2. And we're expecting another little boy in about four weeks.

Q. Sounds like a pretty quiet house.

A. It's chaos.

Q. Good. Good.

Did you go to college?

A. I did. When I graduated high school, I moved out of Milwaukee to Minneapolis and went to the University of Minnesota Twin Cities.

Q. And what did you study there?

A. I studied computer science.

Q. And did you get a degree?

A. I did. I did it in three and a half, got out a

1 little early, and got a BS in computer science.

2 Q. Excellent.

3 Are you currently working for Apple?

4 A. Yes, I am.

5 Q. And what is your title at Apple?

6 A. Right now I'm the manager of the iPod applications
7 teams.

8 Q. Just tell the jury a little bit about what
9 applications are.

10 A. Applications are like computer programs. So, I
11 guess when I'm interviewing people, I say, "The apps are
12 what you see on the screen." So, if you turn on an iPod,
13 you see a menu and a status bar. Anything else on the
14 screen, that's what I'm responsible for.

15 Q. All right. Now, when did you first begin working
16 with Apple?

17 A. I first started while I was still in school. I
18 was an intern with the iPod team in the summer of 2003.

19 Q. And did you then come back and work full-time with
20 them after school?

21 A. I did. So, I finished that summer and I had one
22 semester of school left; so, I finished that and I came
23 back, right after I graduated, to the iPod team in
24 February of 2004.

25 Q. Okay.

1 MR. CORDELL: Can I have DDX 207?

2 BY MR. CORDELL:

3 Q. Mr. Boettcher, this is a demonstrative that the
4 jury has seen earlier. Tell us where in time you joined
5 Apple and started working on the iPods.

6 A. So, when I was there in the summer, we were
7 working on the third generation iPod classic; and that's
8 the one on the bottom there with the line of buttons
9 above the wheel.

10 Q. (Indicating.)

11 A. Yes.

12 Q. And have you then worked on all the Apple iPods
13 that have come after that?

14 A. Yes. I've worked on every iPod that came out
15 since I started working.

16 Q. So, what part of the system is your area? Are you
17 working on the hardware? On the software? On the
18 buttons? What part do you work on?

19 A. I work on the software and -- we've been talking
20 about applications, but there's a number of other things
21 that my team is responsible for. One of them is the
22 application framework that all of the apps are built on,
23 and the media player and the media databases.

24 Q. The jury has already heard a fair amount about the
25 software on these iPods, but one of the things we haven't

1 addressed is how that software might have changed over
2 the years. Can you tell the jury whether or not it has,
3 in fact, changed over the years?

4 A. Absolutely. It changed quite a bit. For each of
5 these iPods, consumer electronics, they came out for
6 Christmas. And for me and my team, that meant that we
7 were working really hard every summer to get the software
8 ready so we could build these things. We had been
9 calling that "iPod summer" internally. It means when you
10 stay late, don't go home all of the time on the weekends,
11 and plan your vacations for the fall.

12 Q. All right. Well, what would you say were the most
13 significant changes in the software from one generation
14 to the next as you moved forward in time?

15 A. So, it changed every year; and a lot of that was
16 to support new hardware. You can see that we brought in
17 color screens and larger displays. But internally there
18 were a couple changes where we rewrote huge sections of
19 the software. I'd say there were three of those.

20 Q. And what were those three?

21 A. Those were -- we rewrote each of these at separate
22 times. One is the media databases, one is the media
23 player, and the other is the application framework.

24 THE COURT: I'm sorry. What was the last one?

25 THE WITNESS: Application framework.

1 BY MR. CORDELL:

2 Q. Okay. Let's start with the media databases.

3 First, tell the jury what the media database is in the
4 iPod.

5 A. The media database is a file on the disk. It's a
6 little hard to describe it. It has all of the
7 information about the songs that are on your iPod. I
8 guess an example would be the title of the songs, the
9 names of the artists and the albums; and there's various
10 other fields. Like you can set a star rating for any
11 song in your iPod. And all of that information is stored
12 in this file called the "media database."

13 Q. And where is the file you call the "media
14 database" stored?

15 A. That's stored on the mass storage, which would be
16 the hard drive or the flash memory.

17 Q. Does the -- well, back in the third generation and
18 fourth generation iPod classics, what was the media
19 database called?

20 A. The database was called the "Dulcimer database" or
21 *iTunesDB*.

22 Q. And did there come a time when you switched to a
23 different media database in the iPods?

24 A. Yes. We rewrote the database and we did that in
25 2009 and the first iPod that has the new database is the

1 fifth generation iPod nano, which is the one on the top
2 right there.

3 Q. Okay. The one that says (reading) fifth
4 generation, September '09?

5 A. Yes.

6 Q. So, let's talk just a little bit more about what
7 the database is. What's the purpose of the Dulcimer
8 database in the -- in all the Apple products leading up
9 to that fifth generation product?

10 A. Well, the Dulcimer database has all of the
11 information that relates to the songs that were sync'd;
12 and that's where we get that information to display the
13 menus in the UI, in the interface. And -- yeah. All the
14 information we need is in that database file.

15 Q. So, let me just take that in a couple of little
16 chunks. You said "UI." What's a UI?

17 A. UI is the -- it's the menus on the screen. It
18 stands for "user interface."

19 Q. And why does the iPod have a user interface?

20 A. If it doesn't have a user interface, you can't
21 move through menus and decide what you want to play.

22 Q. And describe for the jury a little bit about how
23 the iPod uses the Dulcimer database on the iPod.

24 A. The Dulcimer database is -- it's kind of like a
25 read-once thing. It wasn't designed so you can jump

1 in -- it's a very big file, and it's not designed so you
2 can just jump in anywhere in the middle and find a
3 specific piece of information. It was designed to be
4 read and processed start to finish, and that takes time.

5 So, what we do is when we get the disk back,
6 we find this *iTunesDB* file and we read it from start to
7 finish. And as we do that, we find bits of information
8 we know we'll need and we pull those out and we store
9 those in RAM.

10 Q. Okay. You say you store the bits of information
11 in RAM. What's RAM?

12 A. RAM is -- it's a different type of memory, where
13 you can store things; and that's where things need to
14 be -- that's where data needs to be for us to operate on
15 it. It's very fast, unlike a hard drive. And one of the
16 big distinctions is that you lose all of the data in it
17 when the power is disrupted. So, the hard drive, you
18 could say the data is like permanently there; and the
19 stuff in RAM disappears when you turn your iPod off.

20 Q. So, which sets of information does the processor
21 actually use when the iPod is running?

22 A. We do -- everything you see on the display and all
23 the decisions are based on this data that we have in
24 memory.

25 Q. And when you say "in memory," do you mean in RAM

1 or the hard drive?

2 A. Sorry. RAM. I use "RAM" and "memory"
3 interchangeably.

4 Q. So, the processor uses the data in RAM. Is that
5 accurate?

6 A. That's right.

7 Q. And in order for it to use information off the
8 hard drive, it has to go get it and process it before it
9 can actually be used?

10 A. Yeah. There's a -- the thing about hard drives is
11 like they have mechanical parts and disks and they're
12 spinning and it takes several seconds to get the hard
13 drive ready to be able to read anything; so, 2, 4
14 seconds, depending on the hard drive. That would be a
15 really lousy user experience if you push a button and you
16 have to wait four seconds.

17 So, we can go to the drive; but we really
18 designed everything not to. So, we do that once. We go
19 through this database file and we pull out the stuff we
20 know we'll need and we store that in RAM.

21 Q. So, does the Dulcimer database sometimes include
22 playlists?

23 A. Yes. Everything you've sync'd is in the Dulcimer
24 database.

25 Q. Okay. And in the case where the Dulcimer database

1 has a playlist in it, what does the iPod do with that
2 with respect to this business about putting it in RAM?

3 A. Well, so, the playlists are in the Dulcimer
4 database, the ones we've sync'd. And when we're reading
5 through that database, we find them; and we create some
6 in-memory --

7 THE COURT: Excuse me.

8 And I understand this may be how it's normally
9 said. But when you're talking about "we," are you
10 talking about the iPod or are you talking about you back
11 in the lab or your compadres going through the iPod? The
12 record is going to come out a little odd if people are
13 thinking this is a test run that you were making as
14 opposed to what the iPod is doing.

15 MR. CORDELL: I'll try to clear that up, your
16 Honor.

17 BY MR. CORDELL:

18 Q. Let me just ask you, Mr. Boettcher: When you say
19 "we," are you discussing the way the Apple products
20 operate?

21 A. Well, it's I guess a little indirect when I say
22 "we."

23 So, me and my team wrote a lot of the code and
24 I wrote a lot of the code in the iPod and I can probably
25 say "I" in most of these cases because I wrote a ton of

1 this stuff but --

2 THE COURT: But the point is that if he's
3 trying to describe what he is doing, it may not even be
4 relevant. We've got to be describing what the iPod is
5 doing. Now, he may have written the code for it; but
6 that's my problem with this line of testimony and when we
7 get this in the transcript, is we've got these things
8 that he did. And what he did obviously has nothing to do
9 with anything.

10 MR. CORDELL: So, let me ask it --

11 THE COURT: It's what he wrote for the iPod to
12 do.

13 MR. CORDELL: You're right, your Honor; and
14 that's my fault. I asked bad questions. Let me see if I
15 can clear that up.

16 BY MR. CORDELL:

17 Q. So, Mr. Boettcher, in the case where the Dulcimer
18 database has a playlist, what does the iPod do with that
19 information in terms of this business about RAM and what
20 the processor can do?

21 A. Okay. So, the iPod, it only goes to the database
22 once because it can't jump in and randomly find pieces of
23 information that it needs to display the UI and -- that's
24 on a hard disk. It goes through it start to finish, and
25 it generates structures in memory to keep track of the

1 data that it needs.

2 Q. So, if there is a playlist as part of that
3 Dulcimer database, does all or some part of that make it
4 into memory in the iPod?

5 A. Yes. So, a bunch of the information that we're
6 going to need makes it into memory. For example, we need
7 all of the names of the albums that were sync'd so we can
8 show the list of albums in the UI.

9 Q. Okay. But does the entirety of the playlist
10 that's written into the Dulcimer database on the disk
11 make it into hot memory -- into RAM? I'm sorry.

12 A. We display -- we pull up --

13 Q. Let me just stop you. When you say "we," does the
14 Apple iPod do that?

15 A. The iPod pulls out the information it needs about
16 playlists. There's more in the database than the iPod
17 needs to present the UI and to play playlists. So, it
18 takes some subset of the playlist information from the
19 database and generates in-RAM structures.

20 Q. Well, Mr. Boettcher, why doesn't the Apple iPod
21 just go back to the hard disk and re-read the file for
22 the Dulcimer database every time?

23 A. Well, that's -- for a lot of these it's because of
24 the hard drive. So, the hard drive takes two to four
25 seconds to start up; and it also has a huge power drain.

1 These are battery-operated devices, and the designers
2 make them really neat-looking devices; so, the batteries
3 are really small. There's a pretty big impact on how
4 long we can play music if we spin up the hard drive. The
5 hard drive takes away from the number of hours that we
6 can play music.

7 Q. Why does the hard drive take away from the number
8 of hours that the iPod will be able to play music?

9 A. The hard drive is just a really high-power
10 component. Right? It's got metal disks in it. It spins
11 thousands of times a second. Takes a lot of battery.

12 Q. Power hungry?

13 A. Yes.

14 Q. Okay. Now, you mentioned another database that's
15 used, I believe, with the fifth generation nano in the
16 upper right-hand corner of Defendant's Exhibit 207. Tell
17 the jury what database that is.

18 A. The database that we rewrote is called "sequel
19 light."

20 Q. Well, that's a good point. I didn't ask you.
21 Where did the Dulcimer, the old database, come from?

22 A. That one Apple wrote -- well, the format of the
23 Dulcimer database is proprietary to Apple. Apple wrote
24 the entire structure of it.

25 The sequel light one -- we wrote a lot of code

1 that -- there's a lot of code that just deals with the
2 database and we rewrote all of that for the sequel light
3 database but the actual format of the database is sequel
4 and that's an industry standard format. It's not just
5 Apple's.

6 Q. So, let me just make sure that I get this
7 straight. So, there are two databases here, Dulcimer and
8 sequel?

9 A. That's right.

10 Q. Okay. And Dulcimer is for all the iPods up to the
11 fourth generation nano, I guess?

12 A. Right.

13 Q. And then sequel is in the fifth generation nano?

14 A. Yes.

15 Q. And who wrote the Dulcimer database?

16 A. Apple wrote the Dulcimer database.

17 Q. And then tell the jury where the sequel database
18 came from.

19 A. So, there's a -- I guess there's a software
20 component. It's open sourced. And that has the format,
21 and those deal with the low-level format of the sequel
22 light database file.

23 There's a lot of code on top of that that me
24 and my team had to write to work with it.

25 Q. And I think the second difference that you

1 identified in terms of how the software has changed over
2 the years had to do with the playback system or the
3 player system. First, can you tell the jury what the
4 player is in the iPod product?

5 A. Sure. The player is what, I guess, plays songs.
6 I think of it in two parts. There's a higher-level part
7 that I call the "media player," and that knows how to
8 play collections of tracks and go next and previous and
9 repeat.

10 And then there is a lower-level part of it
11 that's more closely tied to the hardware and I call that
12 the "low-level playback system" and it knows how to route
13 the audio data through the various pieces of hardware,
14 which is different on all of these iPods, and it also
15 knows how to decompress different audio formats.

16 Q. Let's start with that lower-level playback system.
17 Did that lower-level playback system change over the
18 years?

19 A. Yes, it did. We rewrote the low-level playback
20 system and at the same time rewrote the media player, and
21 we did that much earlier than the sequel database change.

22 Q. Why did you rewrite the low-level playback system?

23 A. So, it -- I guess it was related to vendors for
24 hardware. So, the chips that came in some of the earlier
25 iPods we bought from a company called "PortalPlayer."

1 And PortalPlayer also supplied the low-level playback
2 system.

3 At some point the first one that we changed in
4 was this second generation iPod nano. We switched to a
5 different company, Samsung. And when we were using
6 Samsung chips, we couldn't use the PortalPlayer code.
7 So, we rewrote the low-level playback system; and since
8 we were doing that, we also rewrote the media player.

9 Q. Okay. So, you threw in the media player on me.
10 That's the upper-level part of the playback system?

11 A. Yes.

12 Q. Okay. And did you say that you rewrote the media
13 player as well when you rewrote the lower-level player?

14 A. Yes. We rewrote both of them at the same time.

15 Q. And when you say you "rewrote" them, did you just
16 take them out and edit them? What did you do?

17 A. Well, I mean, the old media player was called
18 "iTunes Player" and the file it was in was "Player.c" and
19 the new one was called "TPodMediaPlayer" and that was in
20 a file called "TPodMediaPlayer.cpp." So --

21 Q. Can you characterize the changes for the jury?
22 Was this a complete rewrite? Did you just rewrite parts
23 of it? How extensive was that change?

24 A. It was a complete rewrite. I guess the parts that
25 wouldn't change would be the parts that specifically were

1 related to these in-memory structures that we were using
2 with the database because we changed those with the
3 sequel light database in the fifth gen nano. But the
4 media player we rewrote.

5 Q. Can you tell the jury at what point in time this
6 rewrite of the playback system occurred?

7 A. Yes. So, the first one was the second generation
8 iPod nano. That's the second one from the left that's
9 silver, on the top.

10 Q. Okay. That's in September of '06?

11 A. Yes.

12 Q. Okay. So, that means that everything to the right
13 of that included the new playback system?

14 A. That's right. And on the bottom, the sixth
15 generation iPod nano -- or classic. Sorry.

16 Q. That was the first classic in the classic series
17 to have the new playback system?

18 A. Yes.

19 Q. Okay. Did you add any features to the device when
20 you rewrote the playback system?

21 A. Yeah, we did. So, since we were rewriting it, we
22 could, I guess, think forward to the cool things we would
23 want to add. So, on the low level we were a little
24 smarter about caching songs in memory, caching the actual
25 song data so we don't have to hit the disks as often.

1 On the media player side --

2 Q. Can I jump in right there?

3 A. Yes.

4 Q. What does it mean to "cache in memory"?

5 A. "Cache" means to, I guess, talk about song data.

6 So, put the song data in memory and, I guess, put a big
7 bulk of it in memory so you can process that while you're
8 playing back, while the iPod is playing back, and then
9 hit the disk less often, which is really important with
10 the hard drives.

11 Q. I'm sorry to do this to you, but you're going to
12 have to explain what "hitting the disk" is. Nobody is
13 sitting there beating on the hard disk, right?

14 A. Yeah, sorry. It means spin up the drive and read
15 song data from the hard disk. We think it -- I know on
16 the classics it goes to the drive every about 20 minutes.

17 Q. Wow. So, it only reads from the hard drive every
18 20 minutes?

19 A. Yeah, something like that. Something on the order
20 of 20 minutes. And that's really how these things are
21 able to play music so long.

22 Q. Does that have any effect on the reliability of
23 the playback, the fact that you can take in that much
24 music at a time?

25 A. Yeah. Yeah. So, these are spinning devices and

1 people like to run with them and it's -- you get a lot of
2 read errors and other disk failures when you try to read
3 from a hard drive while you're shaking it, which is what
4 you're doing when you're running. So, keeping the disk
5 off for 20 minutes at a time really helps the jogging
6 experience.

7 Q. So, let me take you back. You mentioned that you
8 added a couple of features relating to this caching of
9 the music data. Can you continue with that?

10 A. Yeah. So, we added more sophisticated caching on
11 the low-level playback system side; and then on the media
12 player that plays collections of tracks, when we rewrote
13 that, we were able to add cool features like crossfade
14 and gapless.

15 Q. So, let's take those one at a time. Explain to
16 the jury what the crossfade feature does in the Apple
17 iPods.

18 A. Crossfade is -- it's something you hear when you
19 listen to music on the radio, and it's a blending of two
20 tracks. What that means for the media player is you have
21 Track A, and Track B is going to be next.

22 Q. Let me just stop you there. Track A is a song?

23 A. Yeah. So, Song A and then you have Song B coming
24 after it. And while Song A is playing, before it's done,
25 the media player needs to start playing Song B. And it

1 does that -- these do it -- there's a six-second overlap.
2 And while those songs are playing at the same time, we --
3 the iPod brings down the volume of Track A while it
4 brings up the volume of Track B, and you get a really
5 smooth transition between the songs.

6 Q. So, as Patsy Cline is fading off, Elvis comes up?

7 A. Sure.

8 Q. What is gapless playback?

9 A. Gapless playback is similar. It's -- normally if
10 you listen to music on a CD player or something, Song A
11 ends and there is some amount of silence. It's usually
12 like a second and then Song B begins. And with gapless,
13 the media player needs to get ready to play Song B before
14 A is done so it can bring them up against each other.

15 The place where you would hear that is like
16 live concerts where there is applause between every song
17 and the applause is broken up into two tracks. It will
18 play those gaplessly. The applause would be seamless.

19 The other big one that you would see it is
20 like classical music and symphonies where maybe there is
21 a 40-minute performance and that performance is going to
22 be broken up into several different songs and if you play
23 it gaplessly, it sounds like it is a seamless 40-minute
24 performance.

25 Q. So, are you familiar with the old vinyl phonograph

1 records?

2 A. Like a record player?

3 Q. Yes.

4 A. Yes.

5 Q. So, when you played to those and it would get to
6 the end of the song, you would have a little silence. Is
7 that what you're talking about?

8 A. Yes.

9 Q. And when you do the gapless playback, does that
10 silence still exist?

11 A. No.

12 Q. All right. Let's talk about the application
13 framework if we can for a moment. What is the
14 application framework?

15 A. The application framework is a little difficult to
16 describe. It's this huge piece of software that's really
17 the foundation for the applications, computer programs on
18 the iPod. I guess you can -- if you can see the
19 screens -- as you can see the screens, a lot of them have
20 a menu, a list of items and a status bar along the top.
21 And the framework gives the applications a way to say
22 very easily, "I want a list here and a status bar up here
23 and in the corner I want a battery indicator that updates
24 to show whatever the battery level is." The framework
25 provides those and easy ways to just use those pieces so

1 the applications don't each have to implement themselves.

2 All right? So, the photo app doesn't have to implement
3 the battery indicator; and the music app doesn't, also.

4 Q. And did the application framework change over the
5 history of the Apple iPod?

6 A. Yes. It -- we rewrote that in the summer of 2007.

7 Q. Okay. Where did the old application framework
8 come from?

9 A. The old one was called "Pixo" -- that's P-I-X-O --
10 and Apple bought that from a company named "Pixo."

11 Q. And then where did the new one come from, the new
12 application --

13 A. The new one we wrote, and we called it "Silver."

14 Q. Okay. And can you identify for us where in the
15 timeline that the new application framework was
16 implemented?

17 A. Yes. So, that was the summer of 2007. So, the
18 first iPods that had it were the third gen iPod nano and
19 the sixth gen iPod classic.

20 Q. Thank you. Now, Mr. Boettcher, I'd like to hand
21 you a demonstrative.

22 MR. CORDELL: May I approach, your Honor?

23 THE COURT: You may.

24 BY MR. CORDELL:

25 Q. I'd like you to tell the jury what that is.

1 A. This is a sixth generation iPod classic.

2 Q. So, up on our big board, can you identify which
3 one it is?

4 A. It's the black one on the bottom right.

5 Q. Okay. Now, that's still got its cellophane
6 wrapping; is that right?

7 A. That's right.

8 Q. Right out of the store?

9 A. Yep.

10 Q. Can you go ahead and open it?

11 A. Sure. (Complying.)

12 Q. So, the first thing I'd like you to do before you
13 touch it is -- are you familiar with the way iPods are
14 sold by Apple?

15 A. Yes, I am.

16 Q. And looking at this, does this appear to be an
17 iPod as is sold to consumers all across the country?

18 A. Yes. Everything is individually wrapped, fun to
19 open. That's what it looks like now.

20 Q. Okay. Can you unpack the box and tell the jury
21 what's inside?

22 A. Sure. So, the first thing is the iPod; and it's
23 wrapped in plastic.

24 Q. Why do you wrap it in plastic?

25 A. No fingerprints from the factory.

1 And then there is a plastic tray here with a
2 tab to pull it out and the tray is just a plastic tray
3 and then this is a small envelope that has, I guess,
4 manuals and a sticker, an Apple sticker in it.

5 And then I guess there's three compartments
6 here and in there there's a USB sync cable and some
7 headphones and this is an insert for a dock. All of
8 these iPods are shaped a little differently and the docks
9 are made so you can snap these inserts in and then the
10 iPod will fit just right.

11 Q. So, as you unwrapped it, is the -- are the
12 headphones plugged into the iPod in the box?

13 A. No, they're not.

14 Q. Is the USB cable plugged into the iPod in the box?

15 A. No.

16 Q. And is that true for iPods as they're sold all
17 over the country?

18 A. Yeah. They've always been individually wrapped.

19 Q. And is that true across the entire generation --
20 successive generations of iPods we have up on DDX 207?

21 A. Yes.

22 Q. All right. Can you turn that iPod on?

23 A. I should be able to. We try to ship them with
24 battery power out of the factory.

25 It's booting up. I have an Apple logo.

1 Q. Okay. Can you show that to the jury?

2 A. (Indicating.)

3 Q. Okay. Now, while it's booting up, tell the jury
4 what you can do with an iPod right from the store, what
5 capabilities it has. What can the user do right away?

6 A. Well, you can use the wheel to navigate the
7 interface. The first thing it wants you to do is choose
8 a language. But there's an item on the main menu called
9 "extras"; and there's a bunch of applications there that
10 you can use, some games, contacts, calendars. There
11 won't be anything there, though. There isn't any music.
12 You need to connect to your computer for that.

13 Q. So, let's just take it a step at a time. So, the
14 user, right out of the box, can play games with it?

15 A. Yes.

16 Q. And the user can look at the calendar?

17 A. Right -- well, the calendar won't have anything in
18 it. That comes from the computer.

19 Q. Okay. Can the user set the alarm?

20 A. Yes. You can set alarms.

21 Q. Okay. Now, this is more important, though, sir.
22 Right out of the box, can the user play any music on the
23 iPod?

24 A. No. There's no music on these.

25 Q. Are there any playlists on the iPod right out of

1 the box?

2 A. No.

3 Q. And has that been true for all of the generations
4 of the iPod that we see up on DDX 207?

5 A. Yes. It's always been that way.

6 Q. None of these products shipped with music on it?

7 A. No, they didn't.

8 Q. And none of these products shipped with playlists
9 on it?

10 A. That's right.

11 Q. All right. Okay. So, what does a user have to do
12 in order to get music on their iPod?

13 A. Well, it comes with this USB sync cable; and you
14 connect one end to your iPod and the other end to your
15 computer.

16 Q. All right. Now, when the iPod is connected to the
17 computer, what does the user see on the face of the iPod?

18 A. When the iPod is connected to the computer, we put
19 up a big icon that says, "Do Not Disconnect."

20 Q. Does it flash?

21 A. It -- yeah, it flashes on some iPods.

22 Q. Okay. And when you connect the iPod to the
23 computer and it says "Do Not Disconnect," can the user
24 input anything using the buttons?

25 A. You can always click buttons. But when you're on

1 that "Do Not Disconnect" screen, the buttons won't do
2 anything. All of the applications have been exited, and
3 you're just stuck in that screen until the disk is
4 ejected from the computer.

5 Q. Can you run your finger around the big wheel?

6 A. Sure.

7 Q. And will the iPod do anything?

8 A. No.

9 Q. Okay. Now, is there a particular software program
10 that starts on the iPod when you plug it into the
11 computer? I think it's called "StopUsingDisk."

12 A. There's a function in the code called
13 "StopUsingDisk."

14 Q. Okay. And do you have a computer up there at the
15 witness stand with you, sir?

16 A. Looks like there's one by my feet here.

17 Q. Okay. And --

18 MR. CORDELL: Your Honor, this is Defendant's
19 Exhibit 442. It is the computer that has all of Apple's
20 secure source code on it.

21 THE COURT: All right.

22 BY MR. CORDELL:

23 Q. Okay. So, Mr. Boettcher, I'd like you to show the
24 jury a little bit of code. Is one of the iPods better
25 than another for demonstrating the code?

1 A. I like the third generation iPod nano because that
2 was a long summer; so, I remember it well.

3 Q. Okay. So, what I'd like you to do is I'd like you
4 to pull up the computer, if you can -- and actually,
5 before you do that, let me just have you describe for the
6 jury: How does Apple handle source code?

7 A. Very carefully. So, this computer is in some kind
8 of hard plastic case with two locks on it. I'm not sure
9 if the keys are over here. Yeah, you can't get into it.
10 There are a bunch of passwords to even turn the computer
11 on.

12 THE COURT: Okay. Counsel, we're going to
13 take a break.

14 Ladies and gentlemen, I'll ask you to be back
15 at 11:00.

16 (The jury exits the courtroom, 10:46 a.m.)

17 THE COURT: We'll be in recess until 11:00.

18 (Recess, 10:46 a.m. to 11:01 a.m.)

19 (Open court, all parties present, jury
20 present.)

21 THE COURT: Go ahead, counsel.

22 MR. CORDELL: Thank you, your Honor.

23 BY MR. CORDELL:

24 Q. All right, Mr. Boettcher. I believe you have the
25 computer up on the table now. Can you just point out for

1 the jury what the case is that you were talking about?

2 A. Yes. Here's the computer.

3 Q. Okay.

4 A. Two locks, a lock on each corner.

5 Q. Okay. And do they ship that with special
6 passwords as well?

7 A. Yes, they do.

8 Q. Did you have to sign away your mortgage or
9 anything to take it out of the building?

10 A. I didn't take it out of the building.

11 Q. So, somebody else did. That's even scarier.

12 So, we were talking about the Gen 3 nano; and,
13 in particular, we wanted to talk about what happens when
14 the iPod gets plugged into a computer. Well, you talked
15 about a function called "StopUsingDisk." Is that called
16 when you plug the iPod into the computer?

17 A. Yes, it is.

18 Q. Okay. So, show us where that exists in the code
19 for the iPod Generation 3 nano.

20 A. Okay.

21 Q. So, let me just stop you. So, what are you doing?
22 You have to tell the jury so that the record will reflect
23 exactly what you're doing.

24 A. Ah. So, right now it looks like we're in the --
25 it's an encrypted disk image of all of the code for this

1 case, but we just want the iPod stuff. So, there is an
2 "iPod" folder here; and I'm going to go in there.

3 And then there's all the big models like -- I
4 guess "iPod" means "classic" and then there's "mini,"
5 "nano," and "shuffle." So, I'm going to go into the
6 "nano" folder; and we want the third generation, which
7 the code name was "N46."

8 And I guess I'll go into the latest software
9 version --

10 Q. Let me just stop you. So, when you opened the
11 folder labeled nano Gen 6 *[sic]*, you opened up a bunch of
12 more folders that have these numbers on them. What do
13 the numbers mean?

14 A. These are software versions.

15 Q. And how do software engineers like you name these
16 software versions? How do you know which one came before
17 and which one came later?

18 A. Well, we have different version numbers
19 internally. So, these are really for the world, for
20 users. We start at 1, and then there's always a decimal
21 point and a zero. And then for, I guess, minor updates
22 to the software we increment the number after the decimal
23 point; and for major changes we increment the number
24 before the decimal point.

25 Q. So, is it fair to say that 1.0.3 came after 1.0.2?

1 A. Yes.

2 Q. Okay. And, so, which is the most recent version
3 of the software for the iPod generation nano 6?

4 A. The most recent one would be --

5 Q. I'm sorry. Gen 3. I misspoke.

6 A. Gen 3. The code name was N46. That's why the "6"
7 is up there. We have internal code names for every iPod.

8 So, the latest version will be 1.1.3.

9 Q. Okay. Can you open that file?

10 A. Yes. (Complying.)

11 Q. All right. Now, just briefly can you tell the
12 jury what's contained in that 1.1.3 file?

13 A. There's a bunch of folders. These folders are
14 from the iPod, I guess, source repository where all of
15 the source code is stored. I see that there are some
16 files there with the extension ".h" and ".cpp" and those
17 are source files and that's what we used to build the
18 iPod software.

19 Q. Where is the StopUsingDisk routine contained?

20 A. That is going to be in apps, *iTunes* to Go, main;
21 and then there is a file called "iTunesDataEngine.c,"
22 right here (indicating). I double-clicked that, and it's
23 opening.

24 Q. We're opening iTunesDataEngine.c.

25 And where do we find the routine for the

1 StopUsingDisk function?

2 A. So, I know that it's in this file. There's a lot
3 of lines there. There's 9,000 lines in this file. So,
4 I'm just going to search for StopUsingDisk.

5 Q. So, just to illustrate, when you say you were
6 going to search, what did you do?

7 A. I'm in a text editor here and it has a function
8 called "find" and I did that. I brought up the "find"
9 dialogue and then typed in "StopUsingDisk" and it found
10 that function in this file.

11 Q. So, it looked through all 9,000 lines and found
12 where that "StopUsingDisk" was located?

13 A. Yes.

14 Q. Can you use that text editor to find any variable
15 or character string in the file?

16 A. Yes.

17 Q. Is that the kind of thing people do to find pieces
18 of software?

19 A. Yeah. I do it all day.

20 Q. Okay. Now let me just stop you because this
21 doesn't look like it's written in plain English. What is
22 this computer language?

23 A. This is C++.

24 Q. And what is C++?

25 A. C++ is the computer language we use to bring the

1 iPod software.

2 Q. Have you ever heard of a computer language called
3 "Pascal"?

4 A. Yes, I have.

5 Q. Have you ever used it?

6 A. I haven't used it. It was being taught when I was
7 a junior in high school. There was an AP computer
8 science course and I wanted to take that and the
9 instructor wouldn't let me take it because it was in
10 Pascal and she knew that they were moving to C++ the next
11 year and she was worried that my college credit wouldn't
12 count if I took it in Pascal.

13 Q. What year were you a junior in high school,
14 Mr. Boettcher?

15 A. That was, I guess, 1998.

16 Q. Okay. Thank you.

17 So, you found the StopUsingDisk; and what I'd
18 like you to do is I'd like you to take us through this
19 one step at a time if you can and explain to the jury
20 what the software is doing as you move through the
21 program. So, where does it begin?

22 A. Okay. So, the function "StopUsingDisk," it starts
23 right here (indicating); and that's on line 7313.

24 MR. CORDELL: And, your Honor, what I hope to
25 do is to take Mr. Boettcher through several portions of

1 the code -- and because this is very, very confidential,
2 what I would propose to do is to make paper excerpts of
3 the code he actually testifies about and then have that
4 designated as an exhibit, perhaps 442A, the way
5 plaintiffs have done, and then have that submitted as a
6 sealed record for the case.

7 THE COURT: Any objection?

8 MR. MORTON: No objection, your Honor.

9 THE COURT: We'll do it that way.

10 MR. CORDELL: Thank you.

11 BY MR. CORDELL:

12 Q. All right. Mr. Boettcher, I interrupted. What's
13 the first thing that happens in the StopUsingDisk
14 routine?

15 A. Well, so, there's -- I guess the top 20 lines or
16 so aren't doing that much. It initializes some
17 variables, does some logging. I'll just scroll down to
18 find the first interesting thing here.

19 Okay. So, it calls "prepare for hardware
20 sleep" on -- that's a function of this file.

21 And it calls HandleStopUsingDisk on the music
22 library.

23 Q. Okay. So, first of all, prepare for sleep, what
24 line is that code?

25 A. That was on line 7333.

1 Q. And how do you know that, Mr. Boettcher?

2 A. So, on the window in the text editor I'm using, up
3 here (indicating) in the top left it has the name of the
4 file and that colon and then that number after that is
5 the line that the highlight is on, the text highlight.

6 Q. I see. So, that tells you that the cursor is on
7 line 7333?

8 A. Yes.

9 Q. Okay. All right. Please go ahead.

10 A. So, those functions are going to start to, I
11 guess, clean up the hardware and shut things down so that
12 we can go into disk mode. And the same thing on the
13 music library. This is one of the functions we're going
14 to call to start to throw away those in-memory structures
15 that we had built off the Dulcimer database.

16 Q. When you say "music library," are you referring to
17 the SMusicLibrary line?

18 A. Yes. That's on line 7345.

19 Q. Thank you. All right. Please proceed. What
20 happens next?

21 A. So, after that, the next thing that happens, on
22 line 7348, is a Stop command on media player; and that
23 will stop music playback.

24 Q. Okay. When you say it stops music playback, what
25 happens to the user's experience when that happens?

1 A. Well, if you've heard music, it stops and we have
2 a play/pause indicator in the status bar and that's going
3 to disappear because audio isn't playing. And it's not
4 paused; it's stopped.

5 Q. The music stops?

6 A. Yeah. If you're on the "now playing" screen that
7 showed the current song playing, it exits out of that
8 screen.

9 Q. Okay. What happens next?

10 A. So, next there's five or six lines here starting
11 at 7353; and those deal with writing out preferences.
12 You'll want to get those down to the disk so it
13 persisted.

14 Q. Mr. Boettcher, I may have done this; but I
15 apologize. What line number does the TPodMediaPlayer
16 stop on?

17 A. That is on 7348.

18 Q. And that's what stops the music?

19 A. Yes.

20 Q. Okay. All right. What's the next significant
21 thing that happens in the process?

22 A. Let's see. So, there's a page of code here. It's
23 about 30 lines of code and it starts at line 7367 and
24 this is invalidating. It's throwing away some of these
25 in-memory structures that we had populated with

1 information from the database.

2 Q. So, these in-memory structures that you had
3 populated from the database, is that things like taking
4 bits of the playlist and putting them into RAM?

5 A. Yes. So, here we're starting to throw away all of
6 that because we're going to lose access to the disk and
7 when it comes back, the database may have changed. So,
8 we don't want to have stale information around in RAM.

9 Q. Stale information reflecting, for example, the
10 names of the songs, the old songs?

11 A. That's right.

12 Q. Okay. And why do you bother with clearing out the
13 RAM?

14 A. Well, so, when we get the disk back from the
15 computer, then we're going to have some files on it. We
16 don't know what's there. And I guess if we had some of
17 this old information that we had previously generated
18 from the database, then it just won't match; and you'll
19 have unexpected behavior. You could have instability.
20 Maybe the iPod would crash.

21 Q. Okay. And you've identified a block of code
22 beginning at 7367 for this. Where does it end?

23 A. Let's see here.

24 Q. Well, let me make my question better, then. Where
25 does the process of clearing out the memory end?

1 A. It's -- well, you can say the end of this
2 function, this whole function is doing that and it's a
3 little bit scattered, but it starts there.

4 Q. Okay. Well, where does it go on to the next
5 function? Let me ask you that.

6 A. Well, so, I'm here at line 7419; and it had gotten
7 through a lot of that -- those in-memory structures from
8 the database, and now there are some lines here that are
9 throwing out information about artwork, so artwork for
10 songs that also may be incorrect when we get the disk
11 back.

12 Q. What is artwork for songs, Mr. Boettcher?

13 A. It's like the record or CD cover. We have --
14 we're able to display those images; and like when you're
15 playing a song, we show the album cover for that song.

16 Here we're throwing it out.

17 Q. That's the big picture of Elvis that's on the
18 greatest hits album?

19 A. If that's what was on the cover, yes.

20 Q. And you throw that away, too?

21 A. It's still on the disk.

22 Q. All right. And, so, the line that throws away the
23 artwork, is that 7419?

24 A. That's one of them, yes, 7419. There is another
25 one at 7416.

1 Q. Okay. There's actually one that says

2 "DisposeAlbumArtwork"?

3 A. Yeah. There's three lines there.

4 Q. Okay. What happens next?

5 A. Next it calls into the media player again. I'm
6 looking at line 7428. And it tells the media player to
7 PrepareForDiskMode and that actually causes the low-level
8 playback system to stop doing some things with the
9 hardware that it may be doing to run audio because that
10 would be a problem when you're in disk mode.

11 Q. Why do you care whether the lower-level player is
12 still doing things when you go into disk mode?

13 A. Well, so, the chips need to be set up in a certain
14 configuration to connect to the computer's hard drive;
15 and some of the stuff that the low-level playback system
16 does would interfere with that.

17 Q. Okay. And that lower-level player stop command is
18 at 7428?

19 A. It's 7431, and it calls PrepareForDiskMode on
20 TPodMediaPlayer. And if we jumped inside that function,
21 that would call something on the media caching control
22 architecture which is the name of a low-level playing
23 system on this iPod.

24 Q. What happens next as part of the StopUsingDisk
25 function?

1 A. Next, it's throwing out the artwork database and
2 also the photo albums. You can sync photo albums to your
3 iPod. That works pretty much the same way. We need to
4 get rid of this information in memory because it could
5 change on the disk.

6 Q. So, any pictures that were on my iPod get thrown
7 away, too?

8 A. Any information from the photo database that we
9 had put into RAM is going to be thrown out.

10 Q. I see.

11 A. Whatever is on the disk is still there until it's
12 changed.

13 Q. I see. So, not necessarily -- you're not
14 necessarily throwing away the photos here. You're
15 throwing away the parts in RAM that tell the iPod where
16 the photos are.

17 A. Right.

18 Q. Okay. And -- I'm sorry -- what line is that?

19 A. Let's see.

20 Q. Lines?

21 A. That would be line -- the photo one is line 7442.

22 Q. Okay. What happens next?

23 A. Next, it throws out some font data. Fonts are
24 like the characters that we use to put together to show
25 words on the screen.

1 Then it calls -- I guess the most interesting
2 thing here is "ReleaseDrive." ReleaseDrive is the
3 function that unmounts the hard disk from the iPod
4 software. So, after that function call, the iPod
5 software can't access the hard drive anymore; and we do
6 that so that we can hand it off to the computer.

7 Q. So, the "ReleaseDrive" command, is that at line
8 7465?

9 A. Yes.

10 Q. So, is that sort of the end of the StopUsingDisk
11 process?

12 A. It's the end of this function, yeah.

13 Q. And at that point you say you hand the hard drive
14 off to the computer. What does that mean?

15 A. Well, so, after the drive is unmounted from the
16 iPod, say, applications, then there are some low-level
17 software that implements the USB protocol; and it uses
18 that to make the hard drive available as an external disk
19 to the computer.

20 Q. Now, when you say you "unmount" it from the iPod,
21 you don't physically pull the hard drive out of the
22 device, right?

23 A. No. It makes it unavailable for the applications.
24 So, after this call, if say the photo application tries
25 to open a file on the disk, it would fail. You would get

1 an error.

2 Q. So, can any of the applications on the iPod do
3 anything with the disk after this StopUsingDisk routine
4 is run?

5 A. No.

6 Q. And during this entire process, Mr. Boettcher, did
7 the iPod ever send any information to the computer?

8 A. No. This is just closing down the stuff we have
9 in memory, closing all our files and unmounting the disk.

10 Q. How does the iPod go about reclaiming its disk?

11 A. So, we have an opposing function that's called
12 here and when the disk is ejected from the computer, then
13 a bunch of stuff happens and a lot of that starts in a
14 function called "StartUsingDisk."

15 Q. What does it mean when you say the disk was
16 ejected by the computer?

17 A. Well -- so, the disk shows up like a floppy disk.
18 If you put a floppy disk in your computer, on your Mac,
19 it will show up on the desktop and --

20 Q. Let me just stop you there. When you say "shows
21 up on the desktop," what does that mean?

22 A. I guess I could kind of show right here.

23 There. So, on the desktop here we can see the
24 disks that are available on this computer; and I could
25 drag this one down here (indicating) and eject it and

1 then the disk will no longer be available to the
2 computer. And if that were an iPod, then the iPod disk
3 would be ejected from the computer and StartUsingDisk
4 would be called in our code.

5 Q. So, just for the record, so somebody reading this
6 understands what you did, you pointed to an icon that was
7 on your main computer screen that had a label of "Source
8 Disk" and when you clicked on that, you can do things
9 with it; is that fair?

10 A. Yes. So, I clicked on the disk; and I dragged it
11 down to the trash where -- that's how you eject it -- and
12 "eject" popped up.

13 Q. So, what you meant there is that you could
14 disassociate that hard drive from your computer or
15 disconnect it at least virtually by dragging it down to
16 an icon that would disconnect it?

17 A. Yeah. It's like what we do in StopUsingDisk when
18 we call "ReleaseDrive" here. That unmounts the disk from
19 the iPod software, and that would be -- I guess what I
20 was doing there is I could unmount the drive from the
21 computer and then the computer wouldn't be able to access
22 it anymore and if that disk were an iPod, then iPod
23 software would end up in the StartUsingDisk function.

24 Q. Okay. Well, let's -- so, now let's go back and
25 have you tell the jury how the iPod reclaims the hard

1 drive. How does that work?

2 A. Well, so, in StartUsingDisk we go to the iPod. It
3 looks inside certain folders on the disk. It expects to
4 see a database with a certain file name and finds that
5 database; and then it opens it up, reads it start to
6 finish, and pulls out the information it needs and puts
7 that in RAM.

8 Q. Okay. And what's that function called?

9 A. StartUsingDisk.

10 Q. Can you just illustrate that briefly in the code
11 for the jury?

12 A. Sure. So, again, I'm just going to search.

13 Q. So, for the record, what you're doing is you're
14 typing into that search function the phrase
15 "StartUsingDisk"?

16 A. Yes. So, I've typed in "StartUsingDisk" in order
17 to search. The first one it found was on line 247, but
18 that's just somebody -- that's a function calling
19 StartUsingDisk. It's not the actual definition of that
20 function; so, I'm going to keep going.

21 That's not it.

22 Okay. And it's on line 6920.

23 Q. Okay. And just briefly, what happens in the
24 StartUsingDisk function?

25 A. So, the StartUsingDisk function -- it brings

1 everything back, I guess the first big chunks of stuff.
2 It -- here on line 6962, this is setting up a progress
3 bar which is -- I guess it would indicate the status.
4 We're going to use it -- the iPod uses it to indicate the
5 status of reading the database. So, the database is read
6 from start to finish; and that can take two minutes. So,
7 this is setting up the progress bar to be able to update
8 for those two minutes.

9 Q. And just tell the ladies and gentlemen of the jury
10 what a progress bar is.

11 A. It's like a thermometer. You tip a thermometer on
12 its side, and I guess it illustrates progress. So, it
13 starts completely empty; and when it's completely full,
14 that means that whatever was happening is done. And we
15 update that as we're reading through the database to show
16 our progress.

17 Q. Does that give the user some information that the
18 computer is working -- or the iPod is working its way
19 through whatever it's got to do?

20 A. Right.

21 Q. Okay. And, so, after the progress bar, what does
22 it do?

23 A. If you keep going down, it does some logging and
24 sets up a few variables.

25 The most interesting thing in this function is

1 right here on line 7068 and that is a function called
2 "ReadDulcimerDB" and that's actually where we go in, we
3 find that file on the disk, and we start to process it.

4 Q. So, when you say we find that file on the disk, is
5 it the iPod goes out and looks on its hard disk for the
6 Dulcimer DB file?

7 A. Yes. Inside that function the iPod searches for
8 that -- well, it looks in a certain spot to see if that
9 file is there; and if it is, then it opens it and it
10 processes it.

11 Q. And when it processes it, does it take those bits
12 and put them into memory for the processor's use?

13 A. Yes.

14 Q. Okay. And does that sometimes include playlist
15 information?

16 A. Yes.

17 Q. And just can you summarize what happens through
18 the end of the start disk operation?

19 A. Yeah. So --

20 Q. And I'm sorry. What line number was that?

21 A. ReadDulcimerDB call was on line 7068.

22 Q. Thank you.

23 A. That's actually the -- towards the end of the
24 function there; so, the rest of it is basically just
25 cleaning up. It increments the status bar. It bears

1 some of those in-memory structures so that we can display
2 them while in memory. It gets the number of playlists
3 here. It will use that later. Progress. Progress.
4 Some more logging.

5 So, the end of the function is here on
6 line 7308.

7 Q. Okay. Where it just says "return status"?

8 A. Yes.

9 Q. I see. And there is a comment afterwards that has
10 "StopUsingDisk," but that's the beginning of the routine
11 we already went through?

12 A. Yes. So, StopUsingDisk is after it in the file;
13 but this closed bracket on line 7309, that is -- that's
14 where the iPod processor will stop for this function. It
15 will go somewhere else.

16 Q. And at line 7311 where it says "//StopUsingDisk,"
17 what do computer programmers interpret the "//" to mean?

18 A. So, that's a comment. That's not something that
19 is actually -- when this source code is processed into
20 what actually runs into the iPod, the comments are
21 stripped out. That's just something that we put in there
22 so it's easier to scan the code. There's more than one
23 person that works on this file.

24 Q. So, that's just for the humans?

25 A. Yep.

1 Q. Not regular humans, though, right?

2 A. Software engineers, I guess.

3 Q. Okay. All right. So, I'd like to just try one
4 more thing with the code. I'd like you to explain to the
5 jury what happens internally as the iPod plays music.
6 Can you show us code that shows the iPod playing the
7 playlist?

8 A. Well, there's a lot that's going to happen when
9 you're playing a playlist. I guess do you want to start
10 playing the playlist or...

11 Q. Sure. Let's --

12 A. Update -- or it's updating the screen while the
13 playlist is running.

14 Q. Well, let me try this. Can you show the ladies
15 and gentlemen of the jury the part of the code where the
16 iPod skips from one song to the next?

17 A. Yeah. So, that's going to be in the media player
18 and the file is TPodMediaPlayer.cpp.

19 Q. Okay. And, so, just for the record, you are going
20 back into the menu and you're looking for a folder?

21 A. Yes. I'm back in the source folder here; and I
22 know that the media player is in "silver," "system,"
23 "playback," "media player." And the file I want is
24 TPodMediaPlayer.cpp.

25 Q. Okay. And you're opening that file?

1 A. Yes.

2 Q. About how many lines is TPodMediaPlayer.cpp?

3 A. This file is a little over 3800 lines.

4 Q. Okay. So, can you walk us through how the iPod
5 moves from one song to the next when the "skip" button is
6 pressed?

7 A. Let's see. Yeah. So, there are two ways. I
8 guess the song could be playing and it could end and then
9 if the "skip" button is pressed, that would be next.
10 There's a function called "Next."

11 And here that is on line 1398.

12 Q. For the record, that's "TPodMediaPlayer::Next"?

13 A. Yes.

14 Q. Okay. So, describe for the jury how this works.

15 A. So, let's see. So, this function, it takes in an
16 option and -- I guess you hit "Next" on the button on the
17 Clickwheel, then the option you're going to get is
18 "NextPreviousTrack," and then it jumps into the NextTrack
19 function.

20 Q. Is the NextTrack function in this file?

21 A. It's in this file.

22 Q. Okay. Can you go to that?

23 A. Sure.

24 Okay. That's on line 1626.

25 Q. Okay. What happens here?

1 A. So, this function -- let's see. It finds, I
2 guess, the current item that's playing using the
3 CurrentIndex; and then it calls the NextTrackInternal.

4 Q. And what are those two commands? What lines are
5 those on?

6 A. NextTrackInternal call is on line 1634.

7 Q. Okay. And what -- is that in this file, or do you
8 have to go somewhere else to find that?

9 A. That's going to be in this file, too.

10 Q. Okay. Can you take us there?

11 A. That was quick. That was on line 2719.

12 Q. Okay. And what happens in NextTrackInternal?

13 A. All right. So, this function, it declares a bunch
14 of variables here that it will use later. And then there
15 is some stuff for the Nike app for running. And it keeps
16 on going and handles -- does something for RepeatOne
17 but -- I'm assuming repeat is off here.

18 So, it keeps on going; and where it actually
19 does something, it calls GetNextPlaylistTrack.

20 Q. Okay. And is that what takes you to the next
21 track, the next song?

22 A. Yeah. That's going to increment the index, go to
23 the next song.

24 Q. And is that in this file, or is that somewhere
25 else?

1 A. That's in a different file.

2 Q. Okay. So, I don't want to go too far afield.

3 Just tell the jury what GetNextPlaylistTrack does.

4 A. That will -- I guess you pass in the current
5 track, and then it returns the next track.

6 Q. And what line is the GetNextPlaylistTrack code on?

7 A. The function call is here on line 2802.

8 Q. But the code itself is in another part of the --

9 A. Yeah. That's in Playlist.c.

10 Q. Okay. Let me just ask you this: Mr. Boettcher,
11 is there any code here that allows the iPod to skip six
12 songs ahead?

13 A. No. This just does single song skip, I guess.

14 Q. If I'm listening to Patsy Cline, is there any way
15 for me to say, "All right. Skip to the next country and
16 western song"?

17 A. No.

18 Q. In the code itself -- you mentioned just a moment
19 ago that there was something about a repeat function?

20 A. Right.

21 Q. What is the repeat function in the Apple iPod?

22 A. Repeat is a setting you can set on your iPod; and
23 you can set it to one, which means it will just repeat
24 the same track over and over. I don't really know why
25 people use that. And then there's "repeat all" which

1 will repeat the whole collection of songs, whatever
2 you've been playing. When it gets to the end, it goes
3 back to the beginning.

4 Q. So, if I have a playlist that has Patsy Cline,
5 then Elvis, and then Frank Sinatra on it, if I have the
6 "repeat one" flag set, it will just play one song over
7 and over again?

8 A. Right.

9 Q. Okay. And what if I have "repeat all" set? What
10 will it do?

11 A. "Repeat all," when you -- you have three songs
12 that you're playing; and when you're done with the third
13 song or if you hit "next" on the third song, it will go
14 back to Index 0, which would be the first song.

15 Q. How does the repeat function get set up on the
16 Apple iPod? Does that come from the factory that way?

17 A. No. It's off by default.

18 Q. When you say it's off by default, how does it get
19 turned on?

20 A. There is a "settings" application. It's on the
21 main menu. You see there is an item called "settings."
22 And if you go in there, there is a "repeat" setting. And
23 if you click the center button on it, it will toggle it.

24 Q. And who does that?

25 A. Whoever is using the iPod.

1 Q. The customer?

2 A. Yeah.

3 Q. And that playlist that I just talked about that
4 had Patsy Cline, Elvis, and Sinatra, does the iPod have
5 things other than music in a playlist sometimes?

6 A. Yeah. It doesn't have to be songs. It could be
7 like an audio book.

8 Q. Audio book? So, I could have Patsy Cline, then
9 Elvis, then John Grisham and then Sinatra in a single
10 playlist?

11 A. Yes.

12 Q. So, if I have that and I have Patsy Cline and
13 Elvis and an audio book by John Grisham and then Sinatra,
14 is there any way for me to hit the "skip" button when I'm
15 on that second Elvis song and have it skip right to the
16 Sinatra song over the audio book?

17 A. No. It just goes to the next one.

18 Q. So, if I hit the "skip" button while I'm on Elvis,
19 I'm going to go to the audio book?

20 A. Right.

21 Q. Okay. Mr. Boettcher, we've asked everybody else
22 these questions; so, I feel like I have to ask you.
23 Before this lawsuit, did you ever hear of Personal Audio?

24 A. No.

25 Q. Before this lawsuit, did you ever see Personal

1 Audio's patents?

2 A. No.

3 Q. Before this lawsuit, did you ever hear of

4 Mr. James Logan?

5 A. No.

6 Q. Before this lawsuit, did you ever hear of

7 Mr. Charles Call?

8 A. No.

9 Q. Before this lawsuit, did you ever hear of Dan

10 Goessling?

11 A. No.

12 Q. Did you ever run across a personalized radio

13 product from Personal Audio, LLC?

14 A. No, I haven't.

15 MR. CORDELL: Thank you, your Honor. No

16 further question. Pass the witness.

17 CROSS-EXAMINATION OF JESSE BOETTCHER

18 BY MR. MORTON:

19 Q. Good morning, Mr. Boettcher. You and I have not

20 met previously; is that right?

21 A. That's right.

22 Q. And you had not -- you did not participate in the

23 initial design and development of the iPod; is that

24 right?

25 A. Yeah. The first two iPods came out before I

1 started working for Apple.

2 Q. Right. You started working while as an intern in
3 2003 and then full-time in 2004 after you graduated from
4 college; is that right?

5 A. Yes.

6 Q. You weren't working on an audio player that could
7 download navigable playlists back in 1996 when the
8 patents-in-suit were filed; is that right?

9 A. In 1996 I was in middle school.

10 Q. Thank you, sir.

11 Now, there's been a lot of talk here about
12 source code; and you just showed us some of it on that
13 machine. That machine was produced in this litigation;
14 and you actually helped to put some of that source code
15 on that machine, right?

16 A. I helped identify some source code. I didn't
17 physically transfer any source code to any machines.

18 Q. And you didn't put the wrong code on there. You
19 put the right code for the iPods that we're talking about
20 in this case, right?

21 A. I identified what the lawyers asked for.

22 Q. And you were just going through some of that using
23 a text editor, I think you said, to find certain parts of
24 the file, right?

25 A. Right.

1 Q. And it's helpful, when you're using that, to know
2 what the names of the functions are that you're looking
3 for when you're searching for them, right?

4 A. Yeah.

5 Q. If you had never seen those millions and millions
6 of lines of code before, it would be hard to find all
7 that stuff.

8 A. It takes a little longer. That's where I started.

9 Q. All right. You also helped respond to an
10 interrogatory Personal Audio served in this case about
11 the source code; is that right, sir?

12 A. I remember some interrogatories.

13 Q. If you could just turn your attention to
14 Plaintiff's Exhibit 625A in your binder.

15 A. Where do I find 620A *[sic]*?

16 Q. It should be tabbed. It should be 625A.

17 A. Ah, PX 625A?

18 Q. Yes.

19 A. Got it.

20 Q. Okay. And this is Personal Audio's Interrogatory
21 Number 10. It's got some 80 pages identifying functions
22 and file path names, pretty dense material about the
23 source code; is that right?

24 A. Can I skim through this real quick?

25 Q. Go ahead, sir.

1 A. It must have been nine months since I've seen it.

2 (Perusing documents.)

3 Okay.

4 Q. It's an awful lot of material, isn't it, sir?

5 A. Yes, it is.

6 Q. Just by way of example, just to see how this goes,
7 I'm looking at page 27 in here. There were specific
8 areas asked about, such as this one says for the iPod
9 application on the iPod nano Generation 3, what are the
10 softwares or algorithms that allows a user to navigate
11 forward in a playlist of songs. Do you see that?

12 I've got it blown up on the screen there to
13 make it easy.

14 THE COURT: You've also got a screen there
15 right beside you.

16 THE WITNESS: Oh, that helps.

17 A. Okay.

18 BY MR. MORTON:

19 Q. And, so, for various questions like that, like how
20 do you navigate forward in a playlist of songs in one of
21 these iPods, you helped pull together answers providing
22 all of the appropriate files and functions that might be
23 involved in that, right?

24 A. I don't believe I wrote this. It was run by me to
25 verify that it was right.

1 Q. Okay. So, you did verify that everything in this
2 document is right, correct?

3 A. Yeah. I did my best.

4 Q. And, in fact, on the last page you signed a
5 verification right here (indicating), to the best of your
6 knowledge, information, and belief, the factual
7 statements contained in these responses are true and
8 correct and you declared that under the penalty of
9 perjury and signed your name, right, sir?

10 A. That's right.

11 Q. And you're not here today to change any of the
12 answers you gave here or any of the description of what
13 source code is relevant to the functions involved in this
14 case, right?

15 A. No, not at all. Just trying to be accurate.

16 Q. Okay. And I just want to be sure because
17 Dr. Almeroth, our expert, relies on these answers. He
18 can rely on these as true and accurate answers of how the
19 source code works, right, sir?

20 A. That's the intention.

21 Q. Okay. And then in addition to that, you sat for
22 what is called a "30(b)(6) deposition" where you get to
23 speak on behalf of Apple. Do you recall that, sir.

24 A. I do.

25 Q. And that deposition ran over a day, into the next

1 day. It was about a day and a half, I think, right?

2 A. Yeah.

3 Q. Pretty long slog; and there was a lot of
4 discussion in there about the source code and how it
5 operates for the certain features you were being asked
6 about, right, sir?

7 A. Right.

8 Q. And you gave true and correct answers in that; and
9 Dr. Almeroth can rely on those answers as well, right,
10 sir?

11 A. Everything should have been right, yeah.

12 Q. Okay, good.

13 Now, you mentioned that you got on the iPod
14 sort of project in about 2004 and you made -- over time
15 you made a few changes. Do you recall that testimony?

16 A. Not specifically.

17 Q. Well, you said that you worked on writing the code
18 for TPodMediaPlayer, right?

19 A. No -- I mean, this was nine months or a year ago;
20 so, I'm not going to remember a specific sentence. But
21 yes --

22 Q. No. I'm not --

23 A. -- I absolutely changed code, and I did write
24 TPodMediaPlayer.

25 Q. I confused the issue there. You thought I was

1 talking about your testimony from last summer, and I was
2 just talking about your testimony from a half hour ago
3 when you talked about various changes and additions that
4 you made working at Apple.

5 A. That's right.

6 Q. Do you recall that?

7 A. Yes.

8 Q. Okay. And you worked on, I think you said, going
9 from the *iTunesDB* file to sequel database for the last
10 nano 5, right?

11 A. Right.

12 Q. And you also did some work rewriting some code for
13 TPodMediaPlayer. Do you recall that?

14 A. Right.

15 Q. And you added some features like song -- you said
16 crossfading or gaps or something like that. Do you
17 recall those features you added?

18 A. Crossfade and gapless.

19 Q. Crossfade and gapless. That was it.

20 When you worked on the source code and made
21 those additions, did you ever take out the ability to
22 play playlists on the iPod that are downloaded from
23 *iTunes* -- a computer running *iTunes*?

24 A. Well, the implementation of how all of these
25 things worked was changing; but you can play playlists on

1 all of the iPods.

2 Q. Okay, good.

3 One other question just to -- you had some
4 discussion about the computer programming language.
5 What's the programming language that's used for all of
6 the iPods that you've got in front of you?

7 A. C++.

8 Q. C++ for all of them.

9 And that is a pretty well-known computer
10 language?

11 A. Pretty widely used these days, yeah.

12 Q. Did you say you actually studied that back in high
13 school in the Nineties? Is that right?

14 A. Yeah.

15 Q. Okay. And the way that works is you write that in
16 source code that's sort of human readable, if you're
17 trained properly; and that gets compiled -- you know what
18 "compiled" means, right, sir?

19 A. I do.

20 Q. And it gets put on a processor that's in each of
21 those iPods, correct?

22 A. Well, it gets -- specifically I believe it gets
23 put on the hard disk and then it's loaded into RAM and
24 then run by the processor, yes.

25 Q. Okay. And that's the source code that you've

1 produced that's in that box in front of you and some of
2 which you worked on that makes the iPod work, right?

3 A. Right.

4 Q. And, so, that's on the hard disk, as you said, for
5 all of those iPods and can be used by the processor for
6 all of those iPods?

7 A. Right.

8 Q. And that's the way it comes in the box as it's
9 shipped. It has all of that code on it, correct?

10 A. Well, all the iPods come with software.
11 Otherwise, you wouldn't see the Apple logo when you push
12 the button.

13 Q. Thank you, sir.

14 Now, you talked about -- for a while about
15 some source code related to StopUsingDisk. Do you
16 remember that, sir?

17 A. Yes.

18 Q. Okay. And before that happens, before you get to
19 using the StopUsingDisk code that you looked at, you have
20 to take whichever iPod and connect it to the computer
21 with a USB cable, right?

22 A. Right.

23 Q. And then there's something that happens with the
24 USB protocol between whatever iPod you want to choose and
25 the computer, right?

1 A. Right. They -- the iPods act as standard USB
2 devices.

3 Q. Right. And you work on the software in the iPod;
4 is that right, sir?

5 A. Right.

6 Q. Okay. And the more low-level USB protocol that
7 operates when you plug in an iPod, you're not familiar
8 with that and don't fully understand that technology,
9 right, sir?

10 A. There is a different team I work with; and they
11 maintain that code, yeah.

12 Q. Right. Okay.

13 And do you know who Chris Wysocki is?

14 A. Yes, I do.

15 Q. Okay. Chris Wysocki is sort of the guy who works
16 on syncing, right?

17 A. He's an *iTunes* engineer.

18 Q. *iTunes* engineer?

19 A. He works on the *iTunes* application.

20 Q. Right. But he's well versed in how the sync
21 process operates, right?

22 A. That's right.

23 Q. Okay. Did you know that he was also deposed in
24 this case as Apple's corporate representative when it
25 comes to syncing and how that works?

1 A. I knew a lot of people were deposed. I guess I
2 wouldn't be surprised if Chris was one of them.

3 Q. Okay. Had you heard that as Apple's 30(b)(6)
4 witness, he admitted, at page 161 of his deposition -- we
5 could look at it if we need to -- but lines 2 to 6,
6 question to Mr. Wysocki, "You're not familiar with the --
7 with the protocol between the two of how the iPod devices
8 are first established as a USB-connected drive on the
9 *iTunes* computer"?

10 Answer, "No. I'm not familiar with that
11 process."

12 Did you know he gave that testimony, that he
13 wasn't familiar with the USB protocol?

14 A. Well, Chris is an engineer on the *iTunes*
15 application; and the USB on the computer is implemented
16 by the systems software. So, that would be somebody on
17 the OS10 team.

18 Q. Okay. Now, Mr. Wysocki -- did you know that he
19 was originally scheduled to appear as a witness in this
20 trial?

21 A. I'd seen his name on the email, yes.

22 Q. Right. And -- but, in fact, he is not appearing
23 as a witness in this case. Did you know that?

24 A. I haven't seen him at the hotel.

25 Q. Okay. So, maybe that USB protocol stuff -- we'll

1 just leave that for the experts.

2 MR. CORDELL: Object to the argument, your
3 Honor.

4 MR. MORTON: Withdrawn. I...

5 THE COURT: Sustained.

6 BY MR. MORTON:

7 Q. Okay. Let's turn to another topic. Okay,
8 Mr. Boettcher? And let's talk about something that you
9 flashed up during your direct as a helpful demonstrative.
10 This is DDX 207. It has all of the iPods listed on it
11 that are at issue in this case.

12 I just want to ask you a few questions about
13 all of those iPods. Okay? Can all of the classic, mini,
14 and nanos shown there play audio files?

15 A. Yeah. They're music players. They all play
16 music.

17 Q. Sure. And these may be easy questions.

18 Do all those devices store the audio files in
19 a mass storage device on the player?

20 A. They do all have disks that can store songs.

21 Q. Right. And when they store them there, they're
22 persistent, meaning they -- if you completely turn off or
23 even reset the device, they would still be stored on the
24 hard drive; is that right?

25 A. Right.

1 Q. Okay. And do all of those devices that are at
2 issue also have random access memory, or what's known as
3 "RAM memory"?

4 A. Yes. They all have RAM.

5 Q. Okay. And they all have a processor that can use
6 the programming -- some of which you've helped work on --
7 that's on the iPod, right?

8 A. They all have processors. The processors are
9 pretty different amongst some of them.

10 Q. All right. Now I want to talk to you specifically
11 about something you discussed, the *iTunesDB* file. Okay?

12 A. Okay.

13 Q. Okay. The *iTunesDB* file is stored in the mass
14 storage on these devices separately from the audio files,
15 right?

16 A. Right.

17 Q. And the way it gets there is when you plug in any
18 of these iPods into a computer running *iTunes*, that
19 *iTunesDB* file is transferred from the computer running
20 *iTunes* onto the iPod that you're using, right?

21 A. *ITunesDB* is written by *iTunes*. When the iPod is
22 mounted as a disk on your computer.

23 Q. Right. And, so, when that information comes over,
24 it gets stored in the persistent mass storage on the
25 iPod, right?

1 A. Right. The database is on the disk.

2 Q. And it stays in persistent mass storage until
3 somebody goes and deletes it, right?

4 A. Yeah. It's persistent.

5 Q. And even if you were to reset the device, it would
6 still be stored in persistent mass storage, right?

7 A. Right. You don't lose your songs when the device
8 resets.

9 Q. Right. And you don't lose your playlists, either,
10 right?

11 A. You don't lose your playlists; but when it resets,
12 we do need to process the database again to generate the
13 stuff we put in RAM to generate the UI.

14 Q. Sure.

15 THE COURT: Just for record purposes, what do
16 you mean by "reset"?

17 MR. MORTON: Yes, your Honor.

18 BY MR. MORTON:

19 Q. Can you explain to us what "reset" means,
20 Mr. Boettcher?

21 A. So, reset is -- I guess you would -- that's when
22 the iPod software is interrupted and forced to start over
23 from the beginning, like you disconnected the battery and
24 didn't have any power. You plug it in and it needs to
25 boot up and get the hardware going and turn the screen

1 on, that sort of thing.

2 And the way you do that on these iPods is you
3 press and hold the center button and the menu button for
4 five or six seconds.

5 Q. Okay. And even if you do that, you still have
6 your *iTunesDB* file in the persistent mass storage and
7 your audio files in persistent mass storage when you
8 reboot the device, right, sir?

9 A. Right. When you reboot, you lose everything
10 that's in RAM. Everything on the disk is still there.

11 Q. All right. And when you go to use the *iTunesDB*
12 file, or sequel for nano 5, I think you said you read in
13 the information or data you need from the *iTunesDB* file
14 into RAM so that you can use it; is that right?

15 A. Right. We don't directly, I guess, put things
16 into the UI from the database. We process the database
17 first and generate some structures in memory that are
18 easier for us to manipulate and it's always a subset of
19 what's in the database and that's what we use to display
20 the UI.

21 Q. All right. Thank you.

22 I want to switch to another topic. When you
23 were on direct, you opened up a brand-new classic
24 Generation 6 and took it out of the box. Do you recall
25 that?

1 A. Yes.

2 Q. And do you have it in front of you there? Is
3 there an exhibit sticker? I lost the exhibit number on
4 that.

5 A. I don't know if it has a sticker.

6 THE COURT: I think it was just a
7 demonstrative so far.

8 MR. CORDELL: It was a demonstrative, your
9 Honor. Perhaps we should go ahead and designate it.

10 THE COURT: What's your next number?

11 MR. CORDELL: Your Honor, could we use DDX 500
12 to make sure this is no overlap?

13 THE COURT: All right.

14 MR. CORDELL: Thank you.

15 THE COURT: It will be marked DDX 500.

16 BY MR. CORDELL:

17 Q. Now, when you opened that box, there were
18 headphones in the box, right?

19 A. Right.

20 Q. And there was a USB cable in the box, right?

21 A. That's right.

22 Q. And there were also instructions in the box, and I
23 set those in front of you. Do you recall that?

24 A. Right. There is that envelope behind the tray;
25 and that had, I think, a Quick Start manual and some

1 stickers.

2 Q. Right. Can you look at the instruction booklet
3 and look at the back of that and tell us what it says on
4 the top?

5 A. The blue part?

6 Q. Yeah, the part where it says look for the user
7 guides on the Web site. Can you read that to us?

8 A. Sure. "For complete instructions and important
9 safety information, see the iPod classic user guide,
10 www.apple.com/support/" --

11 THE COURT: Wait. Slow down and speak up.

12 THE WITNESS: Sorry.

13 A. "For complete instructions and important safety
14 information, see the iPod classic user guide,
15 [www.apple.com/support/manuals/iPod.](http://www.apple.com/support/manuals/iPod/)"

16 And then it says "Listen responsibly."

17 Q. Okay. I happen to have the classic 6 user guide,
18 sir, Plaintiff's Exhibit 103. And just in case somebody
19 didn't know what to do with that USB cable, I want to
20 direct your attention to Plaintiff's Exhibit 103 at page
21 11.

22 Are you with me, sir?

23 A. Yeah.

24 Q. I've blown up a part here. It says -- in the
25 classic 6 user guide, "The USB port on most keyboards

1 doesn't provide enough power. You must connect iPod
2 classic to a USB 2.0 port on your computer." Do you see
3 that?

4 A. Yes.

5 Q. All right. And just in case somebody doesn't know
6 what to do with the headphones, let's turn the page. I
7 think it's just the next page in the classic 6 user's
8 guide. It says -- we'll blow up the part with the ear
9 and headphones, too. The picture is helpful.

10 It says, "To use the earphones: Plug the
11 earphones into the headphones port. Then place the
12 earbuds in your ears as shown."

13 Do you see that? Did I read that correctly?

14 A. Yes.

15 THE COURT: What was that page again?

16 MR. MORTON: That was page -- Plaintiff's
17 Exhibit 103 at page 55.

18 THE COURT: Thank you.

19 BY MR. MORTON:

20 Q. All right. Thank you, Mr. Boettcher. No further
21 questions.

22 MR. MORTON: Pass the witness, your Honor.

23 MR. CORDELL: Just briefly, your Honor, may I?

24 THE COURT: Please.

25 *

1 REDIRECT EXAMINATION OF JESSE BOETTCHER

2 BY MR. CORDELL:

3 Q. Mr. Boettcher, Mr. Morton asked you questions
4 about Plaintiff's Exhibit 625A. Do you remember that,
5 the interrogatory responses?

6 A. Yes.

7 Q. Did you say anything today in court that was
8 different from what's in these -- or inconsistent with
9 what's in these interrogatory responses?

10 A. I'd have to double-check it; but no, I shouldn't
11 have.

12 Q. And did you say anything today in court that was
13 inconsistent with what you testified about in your
14 deposition?

15 A. No. That should have been the same.

16 Q. Okay.

17 MR. CORDELL: Thank you, your Honor. Nothing
18 further.

19 THE COURT: Thank you, sir. You may step
20 down.

21 Ladies and gentlemen, we're going to go ahead
22 and break for lunch. I will ask you to be back at 1:00.
23 Please remember my instructions. Even though you've
24 heard a lot of the testimony, don't discuss the case
25 among yourselves.

1 (The jury exits the courtroom, 12:00 p.m.)

2 THE COURT: Okay. Am I correct that's the
3 last witness? You're now ready to rest?

4 MR. SCHUTZ: Yes, your Honor. Personal Audio
5 rests.

6 THE COURT: All right. Okay. Motions?

7 MR. SCHUTZ: Yes, your Honor.

8 MR. CORDELL: Apple makes its motion for
9 judgment as a matter of law pursuant to Rule 50. Should
10 I go ahead and begin?

11 THE COURT: Yes.

12 MR. CORDELL: The first issue that we move
13 under, your Honor, has to do with respect to ownership
14 and standing. The evidence has not demonstrated that
15 Personal Audio, LLC, is the owner of the '076 patent.
16 The most recent indication of ownership in the record is
17 an appeal brief that was actually signed by Mr. Call on
18 September 5, 2000, indicating that Gotuit Media is the
19 real party in interest and the assignee of the then
20 pending application that resulted in the '076 patent.
21 That's insufficient to prove ownership and standing. At
22 this time we would also make a motion to dismiss under
23 Rule 12(h)(3).

24 THE COURT: All right. I'll reserve on that.

25 MR. CORDELL: The next is a similar motion

1 with respect to the '178 patent, again that there is no
2 evidence to establish that Personal Audio, LLC, is, in
3 fact, the owner of the patent. The most recent evidence
4 in the record is an assignment from Gotuit Media to
5 Gotuit Audio in 2006. It was recorded at the PTO and
6 pursuant to the *FilmTec* decision, 939 F.2d 1568 --

7 THE COURT: I'm sorry. Say that again.

8 MR. CORDELL: The *FilmTec Corp* decision,
9 *FilmTec v. Allied Signal*.

10 THE COURT: No, the cite.

11 MR. CORDELL: Oh, I'm sorry. 939 F.2d 1568.

12 That recordation is *prima fascia* evidence of
13 ownership; and because it is *prima fascia* evidence of
14 ownership by Gotuit Audio, we believe that not only have
15 they failed to prove ownership but ownership is actually
16 proved in the name of Gotuit Audio and that is
17 insubstantial -- plaintiff has not carried its burden to
18 prove ownership and standing and, therefore, we also move
19 to dismiss under 12(h)(3).

20 THE COURT: What's your response? Where in
21 the record can you show the contrary?

22 MR. SCHUTZ: I didn't need to, your Honor,
23 because in the court's pretrial order, under stipulations
24 and uncontested facts, which is in the subparagraph E,
25 subparagraph 4, it says Personal Audio, LLC, owns all

1 right to and interest in the asserted patents. The
2 parties stipulated to this, and your Honor signed that
3 order and entered it.

4 THE COURT: Overruled, both of those motions.
5 Is there a reason you're trying to go back on
6 written stipulations?

7 MR. CORDELL: It is, your Honor; and I
8 apologize. I had not recalled that. But the reality is
9 that that was --

10 THE COURT: Well, when you stipulate, you
11 stipulate; and at the end of the trial or at JMOL time is
12 a little late to bring that up.

13 Okay. What's your next one?

14 MR. CORDELL: Well, if I could just finish
15 that --

16 THE COURT: Go ahead.

17 MR. CORDELL: -- thought, your Honor. It was
18 before we deposed Mr. Logan and discovered some of these
19 deficiencies and the record evidence at trial has come
20 out in a way that we didn't expect, but that's the reason
21 for it.

22 MR. SCHUTZ: Just a clarification on that,
23 your Honor. I believe --

24 THE COURT: Well, the stipulation was made.
25 We had a pretrial hearing. There was plenty of time to

1 withdraw or deal with it. There are any number of cases
2 saying you can't start changing up on your stipulations
3 at this time, especially to the very detrimental
4 prejudice of plaintiffs because obviously they're not
5 going to waste my time or the jury's time putting in
6 evidence of something that's stipulated. The real issue
7 starts to become why precious time is being wasted making
8 motions contrary to stipulations. But we'll deal with
9 that later.

10 Go ahead. What are your other motions?

11 MR. CORDELL: Thank you, your Honor. Let me
12 get to the important ones.

13 Personal Audio has not proven indirect
14 infringement of the patents-in-suit in this case. And
15 this I actually do think is part of the stipulations.
16 They have not alleged indirect infringement in the
17 pretrial order. They have not adduced any evidence of
18 indirect infringement. They have not addressed the
19 elements of indirect infringement. Dr. Almeroth didn't
20 testify about indirect infringement; and, therefore, we
21 are entitled to judgment as a matter of law that there is
22 no inducement of contributory infringement in this case.

23 THE COURT: If they didn't allege it, why
24 would I be granting judgment on it?

25 MR. CORDELL: We're a little concerned, based

1 on the way that some of the crosses have gone, that they
2 have been attempting to suggest that it might be
3 appropriate to the jury, for example, to allow the user
4 to be part of the infringement or things that are
5 downstream from the Apple iPod, other elements that are
6 not accused to be part of the infringement case. And,
7 therefore, we do think it is appropriate that we have a
8 judgment as a matter of law on the indirect infringement
9 issue.

10 THE COURT: Well, Mr. Schutz, did you
11 allege -- I don't recall you in the Final Pretrial Order
12 or anywhere along here alleging indirect infringement.
13 Am I wrong about that?

14 MR. SCHUTZ: You're not, your Honor. Again,
15 I'm not sure why that motion is being made. Again, in
16 the pretrial order, under contested issues of fact and
17 law, it's whether Apple directly infringes the patents.

18 THE COURT: All right. I'm not going to issue
19 advisory opinions. They haven't alleged that Mr. Logan
20 broke his leg, either, nor all kinds of other parade of
21 horrors that would be possible.

22 I will take that -- or take your motion into
23 consideration should there be some attempt to claim trial
24 by consent, for example; but as far as granting a JMOL on
25 something that's not in the case, I'm not going to do it

1 at this time.

2 MR. CORDELL: Thank you, your Honor.

3 Now let's move to direct infringement. And
4 I'd first like to begin with places where we believe
5 that, in fact, it relates to the indirect infringement
6 issue, issues with respect for which there has been no
7 evidence that is required in order to make out a direct
8 infringement allegation. And, so, it is our position
9 that Personal Audio has not proven direct infringement of
10 the patents-in-suit, either of the two patents-in-suit by
11 Apple; and its expert, Dr. Almeroth, testified on
12 infringement and alleged that Apple's products infringe
13 merely because of their capability to perform certain
14 functions. But he testified that he has not accused
15 Apple's *iTunes* product and he has not accused Apple's end
16 customers of direct infringement or in participation in
17 the direct infringement.

18 And this gets back to the last issue we talked
19 about with respect to indirect infringement; and
20 Mr. Schutz just acknowledged that they are not, in
21 fact --

22 THE COURT: Well, let's get down to specifics.
23 Is this related to whether or not it's the communication
24 issue, whether or not that USB cable sends a
25 communication to download?

1 MR. CORDELL: That actually gets into the
2 substance and the merits arguments that we'll make.

3 THE COURT: That's -- well, is there any more
4 procedure to be dealt with?

5 MR. CORDELL: Well, this is a quasi procedural
6 issue, your Honor, if I might just -- let me use an
7 example. For example, they have not proven that as sold
8 by Apple, any of the products included playlists. So,
9 the claims require that as sold -- or to infringe,
10 that -- it's their allegation that the selected audio
11 program segments or Selection_Records have to be on the
12 device. But you've just heard Mr. Boettcher testify,
13 your Honor, that as sold, these products have no
14 playlists; they have no music. And, therefore, they have
15 not adduced any evidence that as sold by Apple, that
16 these products have Selection_Records or selected audio
17 program segments. There's no evidence to support that
18 contention; and, therefore, they cannot make out a direct
19 infringement case on that.

20 Number 2, they -- and that's true for the
21 '076 patent, both the selected audio program segments and
22 Selection_Records. The same is true with respect to the
23 '178 claims that require there to be audio programs and
24 there are no audio programs, there are no songs sold with
25 the Apple iPod; therefore, they cannot make out a direct

1 infringement case. It's a legal defect in the --

2 THE COURT: Okay. And setting aside that
3 playlists and songs or whatever are not on there as sold,
4 wouldn't you agree that this last little bit of evidence
5 that came in on the -- actually through yourself -- when
6 you open up the box, the USB cable is there, the earbuds
7 are there and the directions say go to the Web, find out
8 how to use them, and the Web says use them -- are you
9 still pushing that one?

10 MR. CORDELL: I am, your Honor, because if
11 that -- if they were going to rely on that evidence, what
12 they should have done is stood before you and said they
13 were arguing for an inducement case. But they've just
14 confirmed that they are not arguing inducement. And, so,
15 what they're confined to do is they're confined to argue
16 that the products themselves as sold infringe.

17 THE COURT: All right. I think the better
18 view of the law is when you sell everything together in a
19 box like that with instructions saying use it -- that
20 argument will have to be, I think, dealt with at a higher
21 court. If they want to say that you can avoid
22 infringement by, oh, putting a little disk with a program
23 in together with a computer and then say, "Oh, they're
24 separate" -- that seems a little farfetched. I'm going
25 to reserve my ruling on the motion.

1 Are there any other issues? We've got the USB
2 cable not being attached, the --

3 MR. CORDELL: Headphones.

4 THE COURT: -- the headphones not being
5 attached, and the music or playlist not being on the iPod
6 itself. The last one actually gives me more concern.
7 But are there any others?

8 MR. CORDELL: There's one more; and that has
9 to do with the "repeat all" function, your Honor. That's
10 relevant --

11 THE COURT: Is that not on there?

12 MR. CORDELL: It is a capability that the user
13 can enable; but as sold, it is not set. So, again, it's
14 one of these things where the user has to become part of
15 the equation and they have to reconfigure the system.
16 So, as sold, the testimony was --

17 THE COURT: And the reconfiguring consists of
18 pull up the menu and choose that, right?

19 MR. CORDELL: Correct. Correct.

20 THE COURT: Okay.

21 MR. CORDELL: That's claims --

22 THE COURT: All right. I'll reserve my ruling
23 on that.

24 MR. CORDELL: Okay. So, now let's get to the
25 infringement issues that actually were addressed by

1 Personal Audio. And what I'd like to do, your Honor, is
2 to try to take the issues in the order that their expert,
3 Dr. Almeroth, addressed them. And I've shared the
4 court's concern about the level of confusion; so, I'm
5 going to try to just take it the same stepwise that he
6 did.

7 THE COURT: All right.

8 MR. CORDELL: So, I'm going to begin with the
9 only product that he actually took the jury through,
10 which was, I believe, the iPod classic Generation 3.
11 I'll start with -- and he took the jury through
12 Generation 3 with respect to claim 1 of the '076 patent.

13 And in it, your Honor, he did not identify --
14 and plaintiffs have not identified any structure in the
15 accused products that contain the identical or equivalent
16 structure to several of the structures in the court's
17 claim construction. So, I'd like to begin with the
18 "means for continually reproducing element."

19 And for that element Dr. Almeroth did not
20 address the limitation as a whole as instructed by
21 your Honor and create a proper comparison between the
22 corresponding structure and the accused structure. In
23 the case of the --

24 THE COURT: I'm sorry. Tell me again the --
25 means for?

1 MR. CORDELL: Continually reproducing.

2 THE COURT: Okay.

3 MR. CORDELL: This has to do with a codec chip
4 being equivalent to a sound card, your Honor. He offered
5 conclusory opinions about whether or not they were
6 equivalent. However, what the law says is very clear,
7 that equivalents is not a lesser-included offense to
8 infringement. You have to adduce separate evidence.
9 There are separate prongs that have to be addressed, and
10 he simply did not do that.

11 Not a single time during Dr. Almeroth's
12 testimony did the words "function-way-result" part his
13 lips. He did not address the traditional bases for
14 equivalents either under 112 ¶6 or the doctrine of
15 equivalents; and, so, his evidence is deficient on that
16 ground.

17 THE COURT: And that's based on the idea of
18 what a -- the definition of a "sound card"?

19 MR. CORDELL: Yes, your Honor. And generally
20 he -- and I'm proving a negative here. He simply didn't
21 address the equivalents of the accused structures. I
22 don't mean to restrict it to just that. My point here is
23 that --

24 THE COURT: Well, I mean, I remember the
25 debate about is the chip a sound card, is the sound card

1 a chip. But the argument as to when the court uses the
2 words "sound card" -- would you agree that's somewhat
3 definitional? He did say that a chip and a sound card
4 are interchangeable. They're not even different
5 structures. They're the same thing, just different names
6 for it, was the testimony I recall. And for that matter,
7 I think that's in one of Mr. Heller's patents, where he
8 talks about the codec -- the sound from the codec thing.
9 I mean, that -- I'm a little concerned -- I mean, I
10 understand the argument about not deconstructing; but I
11 think that may be a little bit different than just using
12 a word that means the same thing as opposed to different
13 things.

14 MR. CORDELL: Well, my argument goes a little
15 bit beyond that, your Honor, because he didn't point out,
16 for example, whether the differences between the codec
17 and the sound card were insubstantial. Again it's --

18 THE COURT: Well, if he says they're the same
19 thing, then by definition they're not insubstantial.
20 That's what I'm just saying. I mean, if you call a dog a
21 "canine," it's the same thing. And you can't sit there
22 and say, well, they didn't come up with a -- you know,
23 show how they were insubstantial. It was a dog or a
24 canine. If they're two different things, you may be
25 right. But what I heard him say was they were the same

1 thing. And, so, that's -- and to me, there is a
2 difference in that, in the deconstruction cases that I'm
3 familiar with.

4 MR. CORDELL: I understand, your Honor. I
5 think our view of the evidence is that he didn't say they
6 were the same thing. He admitted that there were
7 differences.

8 THE COURT: Okay.

9 MR. CORDELL: And, so, we're put into the
10 rubric of him having to prove up equivalents using some
11 traditional test, function-way-result,
12 insubstantiality --

13 THE COURT: All right. I'll reserve my ruling
14 on that.

15 Is there anything else on that continuously
16 reproducing? I remember the sound card argument. Was
17 there some other part of that?

18 MR. CORDELL: It also talks about going from
19 one Selection_Record in the sequencing file and resetting
20 the CurrentPlay variable. He did not adduce specific
21 evidence as to those. And I think, in his defense, he
22 was relying on the sound card at that point. But we
23 would also point out that he should have addressed the
24 limitation as construed and should have done it very
25 directly and he failed to do that.

1 THE COURT: Now, you're talking about in the
2 list -- what I have labeled as 3, "specifically the
3 algorithm includes" -- it's that third step or what?
4 Which one?

5 MR. CORDELL: So, your Honor, in my book --
6 and I apologize if there is a pagination problem. But at
7 the bottom of page 2 is the "means for continuously
8 reproducing" limitation.

9 THE COURT: Right.

10 MR. CORDELL: And the construction begins with
11 "a sound card that includes," and then there were a bunch
12 of characteristics that come along with it. And to the
13 extent that he addressed anything, he addressed a naked
14 sound card. He didn't address the rest of the court's
15 construction with respect to what that sound card must
16 include; and that is quite a bit, "a general purpose
17 computer programmed to perform" --

18 THE COURT: Wait a minute. It says "a sound
19 card that includes a digital-analog converter" -- okay.
20 I see what you're saying. All right. Go ahead.

21 MR. CORDELL: Well, I guess the court is
22 correct. There is a semicolon there, but I took that to
23 mean that it had to also include "a general purpose
24 computer programmed," et cetera. And Dr. Almeroth did
25 not address the rest of the construction with respect to

1 the "means for continuously reproducing" limitation.

2 THE COURT: Okay. Next?

3 MR. CORDELL: Thank you, your Honor. So, the
4 next one has to do with the "means responsive to said
5 first command" limitation, which I believe appears --

6 THE COURT: Bottom of page 3.

7 MR. CORDELL: Bottom of page 3. Thank you,
8 your Honor.

9 Dr. Almeroth failed to identify and really
10 plaintiffs failed to identify any structure in the
11 accused products that contains the identical or
12 equivalent structure to the structure actually set forth
13 in the court's construction and, in particular, the
14 general purpose computer programmed to perform the
15 algorithm as set forth at the top of page 4, including
16 all three steps: scanning forward in the sequencing file
17 to locate the next Selection_Record of the appropriate
18 LocType, resetting the CurrentPlay variable to the record
19 number of that Selection_Record, and fetching and playing
20 the program segment identified by the ProgramID.

21 THE COURT: Now, is this where you're -- I
22 mean, just to get down to specifics, you're saying that
23 because Apple doesn't have LocType, he hasn't identified
24 a structure which uses that?

25 MR. CORDELL: My point is a little broader

1 than that, but that's certainly part of it. What he did
2 not do is he did not take this algorithm and put it up in
3 front of the jury and say, "Ladies and gentlemen, these
4 are its attributes; but I find something that is
5 equivalent in the Apple device."

6 What he said instead is, "Look, LocType
7 doesn't matter," that when you go to the next song,
8 you're going to go to the next song no matter. So, you
9 don't have to do this algorithm; you don't have to
10 perform these three steps.

11 But, your Honor, that is not equivalents.
12 That is not the proper analysis under the law. He's got
13 to have the specific evidence as to why the differences
14 are insubstantial, and he's got to link those back to the
15 accused structures. He can't just make them in gross.

16 And, your Honor, there is one more aspect of
17 this; and I apologize about the complexity. You just
18 heard Mr. Boettcher testify that the file, the thing that
19 they say is the Selection_Record, is located on the hard
20 disk. And during playback, that's not accessed.
21 Instead, there are bits of information that are put into
22 memory; and that's what the processor uses.

23 So, a significant defect in Dr. Almeroth's
24 analysis is that, in fact, these Selection_Records as
25 they sit on the iPod are not accessed. So, they have

1 both an algorithmic problem in that he didn't prove it
2 up; and they have a data problem because he didn't show
3 that the iPod system actually looks at the thing they
4 call the "Selection_Record" during playback.

5 THE COURT: Now, you're saying that his
6 testimony that he said the Selection_Records were in the
7 hard disk and actually the way the machine is -- the iPod
8 is working is everything is moved into RAM and that's how
9 it plays and it doesn't go back and access the hard
10 drive?

11 MR. CORDELL: That's right. They have said --
12 Personal Audio has said that the Selection_Record is that
13 Dulcimer database file on the hard drive. And during
14 playback -- one of the reasons why this algorithm can't
15 happen is that during playback, the iPod doesn't go look
16 at that file at all. It loads one time when you power it
17 up; and then during playback when you might press a
18 "skip" button, for example, when you press the "skip"
19 button, it only relies on the information that has been
20 loaded into memory. It never goes back and accesses the
21 Selection_Record.

22 THE COURT: And what do I do with the evidence
23 from your witness -- I can't remember if it was Boettcher
24 or the first one -- who says it actually goes back to the
25 hard drive every 20 minutes?

1 MR. CORDELL: If you read it carefully, your
2 Honor -- and it's probably my fault for not making this
3 clear. He was talking about going back to the hard drive
4 for music, for music. He was very clear that with
5 respect to the --

6 THE COURT: Do you remember which person this
7 was?

8 MR. CORDELL: This was Mr. Boettcher.

9 THE COURT: It was Boettcher. Okay.

10 MR. CORDELL: Yes.

11 THE COURT: I couldn't remember if it was him
12 or the first witness.

13 MR. CORDELL: It was Mr. Boettcher, and he
14 said that you don't hit the hard drive to save power.
15 And what he was talking about is 20 minutes of music at
16 that point. He was very clear that the Dulcimer database
17 is loaded once and only once when you power up the
18 machine. And we actually looked at some of the code --

19 THE COURT: Well, it's loaded on the hard
20 drive once; but the statement you're making here is it's
21 not accessed. And I thought he said they go back to it,
22 as he put it "hit," every 20 minutes and that saves power
23 because there is enough on RAM to run the thing.

24 I'm --

25 MR. CORDELL: It's my fault, your Honor. I'm

1 not being clear.

2 THE COURT: Okay.

3 MR. CORDELL: What is on the hard drive that's
4 relevant to this is the Dulcimer database file. And the
5 Dulcimer database file is the thing that has information
6 about the songs and the playlists and everything else.
7 That is a file. That's a file that he said takes a
8 couple minutes to load, and there is a progress bar that
9 goes across the top when they load that file into hot
10 memory off the disk.

11 Also on the disk are the song files. So, each
12 song gets it on file on the disk. When he talked about
13 the 20 minutes business, he was talking about retrieving
14 the songs. He separately testified -- it was very
15 clear -- about the Dulcimer database being accessed once
16 and only once every time you reset the system. He even
17 talked about how you reset the system.

18 And Dr. Almeroth admitted this on cross. In
19 fact, I think it was your Honor's question, if you
20 recall, where you pressed the witness to tell you whether
21 or not when it was turned off, whether that file actually
22 disappeared. And the reason why it disappeared and the
23 reason why that was relevant is that that's the
24 information that the system actually accesses as it's
25 skipping forward or skipping backward.

1 THE COURT: Well, actually what I remember is
2 Mr. Stephens saying, no, it was all RAM and then we had
3 the later witnesses saying, no -- there was a little
4 confusion there.

5 All right. I'll reserve my ruling on that,
6 unless you've got any more on that particular "means
7 responsive."

8 MR. CORDELL: And obviously, your Honor, we
9 specifically would address the algorithm and the elements
10 in the algorithm and the fact that he did not take the
11 jury through the entirety, each of the steps, including
12 the Selection_Record and the LocType and the scanning.
13 Those were all missing from his analysis.

14 THE COURT: So, your argument is unless an
15 expert testifies in a certain format, then that's not
16 sufficient evidence?

17 MR. CORDELL: No. I just didn't hear the
18 evidence. I never heard him give particularized
19 testimony as to equivalents and then link it back to both
20 the patented structures and the accused devices.

21 THE COURT: Okay.

22 MR. CORDELL: It's not a lesser included
23 offense.

24 THE COURT: All right. What's next?

25 MR. CORDELL: All right. The next one, your

1 Honor, is the "means for receiving" element; and this has
2 to do with the USB port.

3 THE COURT: Okay. So, on page 1 of what we
4 set out for the jury?

5 MR. CORDELL: Yes. Thank you, your Honor.

6 THE COURT: Okay.

7 MR. CORDELL: So, with respect to the "means
8 for receiving" element, your Honor, Dr. Almeroth again
9 failed to identify any structure in the accused products
10 that contains the identical or equivalent structure to
11 the structure actually identified in the court's claim
12 construction. He only relied upon the infrared link for
13 connecting a local communications server linked to the
14 Internet.

15 The problem with that is that he didn't -- he
16 never did address whether or not a USB 2.0 is equivalent
17 to an infrared link, *per se*. There was some general
18 discussion of USB, but he never addressed the actual 2.0
19 standard.

20 And more to the point, your Honor, 2.0, the
21 evidence is very clear, is after-arising technology. And
22 again that's a topic that he did not address.

23 THE COURT: You're saying that because -- it
24 sounds like in one argument you're trying to have your
25 cake and eat it, too, and argue it from both sides. So,

1 let's break it down.

2 You're saying, then, that his discussion of
3 the IrDA, the infrared connection, he didn't show or say
4 was equivalent to -- or equivalent structure to the USB
5 or, I guess, FireWire?

6 MR. CORDELL: That's right, your Honor.

7 THE COURT: Okay.

8 MR. CORDELL: He did not do that.

9 THE COURT: But, of course, he doesn't have to
10 say it all if they can bring it in through other
11 testimony such as through your own witnesses, correct?

12 MR. CORDELL: Correct, your Honor; but they
13 did not adduce that evidence. They attempted to adduce
14 other evidence -- but it's our position that they
15 haven't. They attempted to adduce other evidence through
16 Mr. Heller and they showed him one of his patents and
17 said, "See there? It says use you can use a wired
18 connection or alternatively you can use a wireless
19 connection."

20 He's got two problems there, your Honor,
21 Personal Audio does. Number 1, Mr. Heller said,
22 point-blank, that he didn't know whether that wireless
23 included IrDA; and, in fact, I think he said on redirect
24 that it was generally considered to be a different --

25 THE COURT: Well, I also recall him saying one

1 of the differences between infrared and WiFi is that with
2 infrared you couldn't charge your player; and I'd be real
3 surprised if WiFi signals charge your player.

4 MR. CORDELL: That would take one strong WiFi
5 signal, your Honor.

6 THE COURT: So --

7 MR. CORDELL: Wouldn't want to be too close to
8 it.

9 THE COURT: Based on that statement of his,
10 I'm not so sure about the credibility of that particular
11 statement and when he was saying he didn't know or -- I
12 mean, that distinction there got a little bit weak as
13 soon as he said that one. I'm not talking about all of
14 his testimony, but right in there he was obviously
15 confused.

16 So, what you're saying, though, as I
17 understand it, is that they failed to show that the IrDA,
18 the infrared, is not -- which they mentioned is not
19 equivalent to what you use or *vice versa*.

20 MR. CORDELL: That's right. And just to
21 address Mr. Heller's point, I think that the point he's
22 making is that they didn't consider it to be a substitute
23 that had insubstantial differences. And he would have
24 probably said the same thing about 802.11 if we had asked
25 him.

1 THE COURT: Which is?

2 MR. CORDELL: Wi-Fi.

3 THE COURT: Okay.

4 MR. CORDELL: He would have said the same
5 thing about Wi-Fi if we had asked him that because the
6 issue is whether it's a substitute with insubstantial
7 differences. So, I think his *PowerPoint* is still valid.

8 But more than that, your Honor, the evidence
9 doesn't hold up IrDA and compare it to USB 2. And one of
10 the things that they did with their evidence is they put
11 in a paper from 2000, this HP reference that we saw this
12 morning. And they said, "Aha, look, there is IrDA that
13 operates at a higher speed."

14 But here is where they can't take advantage of
15 the date. Here is where they can't say what we put into
16 the patent application is to be adjudged as of 2001 when
17 the patent issued because the words "IrDA" had a meaning
18 when it was filed in 1996 and that's what they're held
19 to. They can look at structures and ask the question as
20 to whether or not they're equivalent in 2001, but they
21 don't get to promote their technology.

22 So, IrDA was as it was in 1996 when they filed
23 the patent application. They don't get to take that slim
24 reference to infrared and say that we're going to take it
25 up through the years, through all the advancements and

1 all the revisions that it went through, and make that the
2 structure that's in the patent. That, they didn't do.
3 So, that's a problem with it.

4 THE COURT: All right.

5 MR. CORDELL: Then there's one more point on
6 that, your Honor. And with respect to the patent they
7 relied on from Mr. Heller, that's in 2002, in June or
8 July of 2002. That is about a year and a half removed --
9 or year and a quarter removed from the key date here in
10 March of 2001.

11 THE COURT: All right.

12 MR. CORDELL: As part of that limitation, your
13 Honor, can I pile on just one more?

14 THE COURT: Sure.

15 MR. CORDELL: The limitation says that you
16 have to derive data from the Internet. It's not simply
17 that you have an infrared link or a means for receiving
18 and storing. The entirety of the construction says a
19 conventional high-speed data modem and dialup driver,
20 et cetera, linked to an Internet service provider which
21 provides access to the Internet.

22 There has been zero evidence, zero evidence,
23 that anything that the iPods connect to is then in turn
24 connected to the Internet. That simply hasn't been part
25 of their proof. It's a significant defect, and this

1 limitation cannot stand.

2 THE COURT: Which gets to your overall
3 argument that this was really a patent for bringing stuff
4 down from the Internet to your radio -- or your player to
5 use on your way to work.

6 MR. CORDELL: Correct, your Honor. Correct.
7 And it also shows up again -- I'm reminded -- in
8 element 4 of the court's construction where it talks
9 about an infrared link for connecting to a local
10 communications server computer linked to the Internet,
11 and that is the structure they pointed to for this
12 limitation.

13 THE COURT: Okay. All right. Go ahead.

14 Would you go ahead and tell the jury that
15 lunch is probably going to take a little bit longer, so
16 they don't have to eat as fast?

17 COURT SECURITY OFFICER: Yes, sir.

18 THE COURT: My guess is it's probably going to
19 be, well, at least 1:15, maybe a little longer.

20 COURT SECURITY OFFICER: Yes, sir.

21 THE COURT: Go ahead.

22 MR. CORDELL: Thank you, your Honor.

23 And then just one last point on that one, your
24 Honor, I'm reminded. They also did not point to any
25 source code or any specific characteristic of the iPod

1 that specially adapted the means for receiving. They
2 point to a generic port. They say, look, there is a port
3 on the iPod that could be used for all of these various
4 things. It could be connected to computers. It could
5 be -- there's lots of "could be's" in their proof; but
6 they put in zero --

7 THE COURT: Wait a minute. Where are you --

8 MR. CORDELL: I'm still on the "means for
9 receiving." I'm sorry, your Honor.

10 THE COURT: Okay. And...

11 MR. CORDELL: The point is they point to a
12 port on the iPod, and they say, "Aha. Look. There is a
13 port that could be connected to a cable or an infrared
14 device and could be connected to a computer and could be
15 connected" -- there are a lot of "could be's." But
16 they've put in no evidence to support the notion that
17 that port is in any way specially adapted for that
18 purpose. There has been no evidence, no source code or
19 any other evidence to suggest that the port on an iPod is
20 specially adapted in the way the claims require.

21 So, what they are relying on is a generic port
22 and they're saying because these things are theoretically
23 impossible, there must be infringement and that's
24 improper.

25 THE COURT: Okay.

1 MR. CORDELL: With respect to the accepting
2 control commands element, which is on page 2, the
3 testimony was, in fact, that the buttons on the iPod are
4 a keyboard. But, again, there was no evidence with
5 respect to equivalents. There was nothing to suggest the
6 function-way-result analyses was satisfied. There was
7 nothing to say that the differences were insubstantial.
8 And, therefore, we move for judgment on that basis as
9 well.

10 THE COURT: I will overrule that. Almeroth's
11 testimony, I think, was fairly clear and direct about the
12 buttons being equivalent; and it didn't have to be all of
13 those structures. It just had to be one of them, a
14 keyboard. So, I'm going to overrule that motion.

15 MR. CORDELL: Thank you, your Honor.

16 The "means for storing" element, which is on
17 the first page.

18 THE COURT: Okay.

19 MR. CORDELL: And the issue here, your Honor,
20 is whether a hard disk drive is the equivalent of some
21 kind of silicon-based memory. And, again, we believe
22 that plaintiffs have not put in evidence as to the
23 precise proof required in order to make out equivalents.
24 They haven't shown us function, way, and result. They
25 haven't argued the insubstantial differences. They have

1 no evidence of the insubstantial differences. It's got
2 to be particularized with the linking argument, and it's
3 not there.

4 THE COURT: Well, wait a minute. They don't
5 have to get into equivalents if they show a data storage
6 system consisting of both high-speed RAM storage and
7 persistent mass storage. Why do they have to get
8 equivalents if they show what -- if they identify what
9 the structure is?

10 MR. CORDELL: I'm presenting this badly, your
11 Honor. I apologize.

12 THE COURT: Okay.

13 MR. CORDELL: What I'm actually asking for
14 judgment on is on the flash-based devices. They haven't
15 shown the equivalents of a hard drive to a flash-based
16 device.

17 THE COURT: Which are which ones?

18 MR. CORDELL: All the nanos, your Honor.

19 THE COURT: So, you're saying the flash-based
20 devices -- is this the NAND storage --

21 MR. CORDELL: Yes, your Honor.

22 THE COURT: -- argument?

23 MR. CORDELL: Yes. They employ NAND flash
24 instead of a hard disk.

25 THE COURT: I thought that question came up

1 about NAND being persistent. It doesn't have to be a
2 disk. It just says "persistent mass storage such as
3 magnetic disks." But if NAND is a persistent mass
4 storage device, I'm not sure why that isn't actually
5 identified as stated. It's not an equivalent structure;
6 it is the structure. And I thought we went through that.

7 MR. CORDELL: I do recall testimony that NAND
8 was, in fact, persistent, your Honor.

9 THE COURT: Okay. I'll go ahead and overrule
10 that particular part of the motion, then.

11 MR. CORDELL: With respect to the doctrine of
12 equivalents, your Honor, we move for judgment as a matter
13 of law that Personal Audio has not adduced any evidence
14 with respect to DOE for any of the '076 claims.

15 Dr. Almeroth, I believe, admitted that he was
16 not relying on DOE for any of the '076.

17 THE COURT: Is that correct, Mr. Schutz, or
18 Mr. --

19 MR. HOLDREITH: Yes, sir. We are not
20 asserting a doctrine of equivalents for the '076.

21 THE COURT: Okay.

22 MR. HOLDREITH: As opposed to structural
23 equivalents, of course.

24 THE COURT: Okay. So, there will be no DOE
25 question on claim terms -- or claims of the '076 patent.

1 MR. CORDELL: And now, your Honor, I'd like to
2 turn to the sufficiency of the evidence with respect to
3 the iPod classic -- I'm sorry -- all of the products with
4 the exception of the iPod classic Generation 3 for
5 claim 1 of the '076 patent.

6 And here, if the court recalls, Dr. Almeroth
7 took the jury through the iPod classic Generation 3; and
8 he addressed many of the limitations at least of claim 1
9 of the '076 patent. He then simply said, "The rest of
10 the products behave in the same way."

11 We believe that that evidence is insufficient
12 to support a judgment that the rest of the products
13 infringe. In particular, Dr. Almeroth failed to identify
14 any structure in the accused products that contains the
15 identical or equivalent structure to the entirety of the
16 court's claim construction, for example, the means for
17 storing. And that's a significant defect when we get to
18 the iPod nano because he didn't specifically address the
19 equivalents of the flash storage with respect to the
20 means for storing element.

21 THE COURT: Well, as to that last, I'll
22 overrule that on the same basis because he did bring up
23 the NAND and that was persistent storage. I think you
24 just agreed with that one.

25 As far as his presentation, the way he did it

1 going through and identifying the exhibits which
2 pertained to the other devices, I'm going to overrule
3 that JMOL on that being insufficient evidence. It
4 obviously may be something the jury will consider when
5 they're deciding. I think if they believed him and they
6 look at the documents that were put in evidence, there is
7 a basis there to support his opinion; but that's really
8 more -- what you're talking about really goes more to
9 weight than insufficiency. So, I'll overrule that.

10 MR. CORDELL: And, your Honor, could I also
11 make the same motion with respect to those elements not
12 specifically addressed with respect to products other
13 than the classic Generation 3 with respect to any
14 equivalents showing under means-plus-function?

15 Dr. Almeroth -- and we'll, of course --

16 THE COURT: You're talking about structural
17 equivalents?

18 MR. CORDELL: Structural equivalents. Thank
19 you, your Honor.

20 Personal Audio adduced no evidence as to the
21 function-way-result or the insubstantiality of the
22 differences between all of these other products and their
23 structures and the claim construction requiring a
24 particular structure and its equivalents.

25 THE COURT: Okay. I think that will rise or

1 fall on these other particular motions you've made as to
2 the means-plus-function -- in other words, you've gone
3 through several of them individually, pointed out "He
4 didn't point out this, he didn't establish that." I
5 think they all rise and fall together rather than just as
6 in a group, for those same reasons in terms of the way
7 they did it.

8 Given -- or keeping in mind the time
9 limitations I'm putting on both sides and keeping in mind
10 the way -- and the evidence did come in. I disagree -- I
11 mean, if, for example, I agree with you on some of the
12 other individual means-plus-function, then I think that
13 applies to all of them. They rise or fall on that, not
14 on just a generic "the other ones go because they weren't
15 there."

16 I think there was enough there. If the jury
17 believes him, if they accept that evidence, it's there.
18 Although, all of that is subject to all of my rulings on
19 these other ones that I said I'd reserve a ruling on.

20 MR. CORDELL: Your Honor, could I have an
21 understanding that I have made that motion with respect
22 to each of those elements for each of the accused product
23 groupings so that I don't have to go through them one at
24 a time? And that motion --

25 THE COURT: Yes. In other words, when you're

1 pointing out that he failed, for example, to identify a
2 structure -- the ones we've just gone through, yes, I
3 take that as applying to the groups of accused products.

4 MR. CORDELL: Thank you, your Honor.

5 And the only additional argument is that he
6 failed to offer that specific testimony on equivalents
7 with particularized emphasis on function-way-result,
8 insubstantiality differences, or some other test.

9 THE COURT: Well, to the extent you've pointed
10 out particular items, I will -- I've already said I'll
11 take that under advisement.

12 MR. CORDELL: Thank you.

13 THE COURT: But in terms of some broad, "Oh,
14 here's another one that we think about now on appeal,"
15 the whole point of this is -- and I think just to protect
16 your record on appeal, you have to state it. You run a
17 great risk if you fail to state it so --

18 MR. CORDELL: So, I --

19 THE COURT: In other words, I'm going to
20 say -- all right. Just to be clear, you've made
21 arguments on any number of these means-plus-function
22 elements. You went through a number of them and you've
23 cited the specific deficiencies and I will take that as
24 applying to each of the accused products, not just one of
25 them.

1 So, if I rule with you as to the classic, I
2 think it applies to all of them -- the same arguments
3 apply to all of them. I suppose I wouldn't necessarily,
4 based on the evidence, agree on each one; but your
5 argument is there.

6 But to just say in general, "He didn't meet
7 the requirements of proving means-plus-function as to all
8 of these but I'm just not going to tell you exactly which
9 elements he missed, we'll bring that up when we get our
10 great appellate lawyers who have weeks and months to
11 think about it," that's not proper because technically
12 they get to reopen if some glaring deficiency was brought
13 up.

14 MR. CORDELL: But my understanding of the
15 court's ruling is that to the extent that I have raised a
16 limitation and pointed out a deficiency in their proof as
17 to that limitation, if that limitation applies in several
18 claims and across several products, I will have been
19 deemed to have raised the argument for those claims and
20 those products.

21 THE COURT: Well, to the extent that you've
22 got a dependent claim, then it goes back to one. But the
23 fact, for example, you have the means for receiving --
24 well, that's in claims 1 and 3. So, yes, it would apply
25 to both claims 1 and 3, as we see on this chart. You

1 know, on page 1, for example, there is the "means for
2 receiving and storing a file of data establishing a
3 sequence."

4 We find that in the '076 patent claims 1 and
5 3. My ruling would then apply to that as used in both
6 places. But if, for example, similar words were used in
7 some other claim -- and I don't know why it wouldn't be
8 on the chart; but, I mean, I'm not going to go search for
9 it. It's as set out on the chart.

10 MR. CORDELL: That's right, your Honor; and
11 that's my intention. I just don't want to repeat it for
12 each of the claims.

13 THE COURT: No. No, no. Your arguments I
14 take as applying to the claims as set out in the chart.
15 When you're talking about that means-plus-function, the
16 chart shows it applies to claims 1 and 3. I take it
17 you're raising that as to claims 1 and 3.

18 MR. CORDELL: Thank you, your Honor.

19 May I have just one second?

20 Your Honor, staying with the '076 patent,
21 there are a couple claims that are slightly different
22 so --

23 THE COURT: All right.

24 MR. CORDELL: They've alleged infringement of
25 claim 3 and claim 15. And, again, it is our position

1 that plaintiffs have failed to put on sufficient evidence
2 to carry the burden of infringement on these claims. And
3 again --

4 THE COURT: Okay. And as we've noted, you've
5 already made some attacks on claim 3 because we've seen
6 that on some of the ones you've covered. If there are
7 some other attacks on claim 3, set them out.

8 MR. CORDELL: They are consistent, your Honor.
9 It's the -- the limitations, however, are phrased
10 slightly differently. So, it's "processing means
11 responsive to a first one of said control commands."

12 THE COURT: Where is --

13 MR. CORDELL: It's back on page 6.

14 THE COURT: Okay. And this applies to
15 claim 15?

16 MR. CORDELL: Yes, your Honor.

17 THE COURT: Okay. Go ahead.

18 MR. CORDELL: And it is, in fact, a different
19 statement of a very similar structure; so, we would make
20 the same motion that, in fact, plaintiffs have failed to
21 adduce evidence and provide particularized evidence or
22 testimony in linking back to any equivalents for the
23 processing "means" limitation for the "means responsive
24 to two consecutive ones of said control commands"
25 limitation.

1 THE COURT: What is it you're thinking was not
2 specifically identified? I mean, keep in mind he doesn't
3 have to do an equivalent structure if he shows it's
4 actually there present in the iPod. What is it that
5 you're saying was missing?

6 MR. CORDELL: In the processing means, your
7 Honor?

8 THE COURT: As to that limitation, right.

9 MR. CORDELL: So, the bottom of page 6 -- it's
10 actually very similar to the one that we covered earlier
11 in that it requires a general purpose computer programmed
12 to perform the algorithms set forth at the top of page 7,
13 which includes scanning forward in the sequencing file to
14 locate the next Selection_Record --

15 THE COURT: Wait a minute. I'm looking at the
16 definition. I'm not seeing the "computer" on this
17 processing means.

18 MR. CORDELL: There are two processing means,
19 your Honor. This is the one at the bottom.

20 THE COURT: Oh, okay.

21 MR. CORDELL: Sorry.

22 THE COURT: All right. Okay. And what is
23 it -- tell me again what it is you're saying that he did
24 not -- that was not identified in the -- the limitation
25 or the part of the limitation that was not identified in

1 the accused products.

2 MR. CORDELL: The plaintiffs have failed to
3 adduce any evidence as to the presence or equivalents of
4 the general purpose computer programmed to perform the
5 algorithm the court identifies at the top of page 7.

6 THE COURT: Okay. So, you're saying that
7 what's in there is not a general purpose computer, what's
8 in the iPod would not be considered a general purpose
9 computer.

10 MR. CORDELL: Programmed with the algorithm
11 that --

12 THE COURT: Well, there's two parts. First of
13 all, I want to know if there is a computer; and then I
14 want to know if you're talking about the program.

15 MR. CORDELL: We don't contest that there is a
16 general purpose processor. We might quibble about
17 computer but --

18 THE COURT: Okay. So, what we're talking
19 about is that it has this algorithm.

20 MR. CORDELL: Correct.

21 THE COURT: Okay.

22 MR. CORDELL: And again it's the same
23 arguments that I made earlier. Plaintiffs did not take
24 that limitation as a whole and then adduce any
25 differences or similarities to the Apple structures.

1 They didn't have function-way-result test. They didn't
2 suggest anything about the substantiality of the
3 differences. All they did was to say it doesn't matter
4 if you don't have a Selection_Record with an appropriate
5 LocType.

6 THE COURT: All right. And that's back to
7 Figure 5 where basically Dr. Almeroth said since they're
8 all the same, they just go on to the next one because it
9 doesn't have to go through that more complex formula?

10 MR. CORDELL: Correct. You don't have to do
11 the three steps at the bottom of the --

12 THE COURT: Okay. I will reserve my ruling on
13 that.

14 MR. CORDELL: And the same argument here, your
15 Honor, is -- and I don't want to spit it out completely
16 again if I can avoid it. But it is this notion that
17 there is no access of a Selection_Record doing playback.
18 So, the Selection_Record that plaintiffs say exists on
19 the iPod is that Dulcimer or sequel database that sits on
20 the disk; and they haven't adduced any evidence that that
21 is actually accessed during playback.

22 THE COURT: Okay. Does that cover that one?

23 MR. CORDELL: It does, your Honor.

24 THE COURT: I'll reserve my ruling on that
25 one.

1 MR. CORDELL: The "means responsive to two
2 consecutive ones of said control commands," which is on
3 page 5 -- and that's the part of it that applies to
4 claim 3. Again, the arguments here --

5 THE COURT: Wait, wait. Okay. So, we're back
6 to page 5, looking at patent claim 3. Go ahead.

7 MR. CORDELL: Yes. I apologize.

8 And again the argument is that the specific
9 structure that the court set out here was never addressed
10 by Dr. Almeroth or any witness on behalf of plaintiffs.
11 There was no evidence adduced as to the equivalents,
12 function-way-result, alleged insubstantiality of
13 differences between what is set forth here in the court's
14 claim construction and the structures in the iPod
15 products.

16 THE COURT: All right. I'll reserve my ruling
17 on that.

18 MR. CORDELL: Okay. Going now to the court's
19 claim construction for "means for accepting control
20 commands," which is on page 2.

21 THE COURT: Okay.

22 MR. CORDELL: One moment, your Honor.

23 THE COURT: I thought we went through that
24 once, and I thought I overruled it.

25 MR. CORDELL: We have been through it, your

1 Honor. I can't recall your ruling, but I'll go on.

2 I'd now like to address the "processing means
3 for translating" element on page 6. This is in claim 15.

4 THE COURT: All right.

5 MR. CORDELL: And the construction here is "a
6 sound card that includes the digital-to-analog converter
7 and directs the converted analog audio signals to
8 headphones or one or more speakers." Again, it is our
9 position, your Honor, that plaintiffs did not adduce
10 sufficient evidence to prove that the codec in the Apple
11 products is the equivalent of a sound card, with all of
12 the features that it lists.

13 THE COURT: All right. What's next? I'll
14 reserve my ruling on that.

15 MR. CORDELL: Thank you.

16 I'd like to move to the '178 patent.

17 THE COURT: Okay.

18 MR. CORDELL: And here, your Honor, it's our
19 understanding the court has already rendered judgment as
20 to literal infringement; so, I will reserve any motions
21 on that issue.

22 THE COURT: Okay.

23 MR. CORDELL: Your Honor, I'm advised that out
24 of an abundance of caution I'd like to make a motion on
25 literal infringement for the reasons set forth in our

1 motion for summary judgment. We would renew that as a
2 motion *in limine* [sic], including the differences --

3 THE COURT: Motion *in limine*?

4 MR. CORDELL: I'm sorry. A JMOL, your
5 Honor -- thank you -- under Rule 50.

6 THE COURT: But I've already granted that in
7 the summary judgment, right?

8 MR. CORDELL: Yes.

9 THE COURT: Okay. My ruling stands on that.

10 MR. CORDELL: And we also have additional
11 arguments that we've made with respect to some of these
12 limitations that we identify with respect to the
13 '076 patent, for example, the "processor for continuously
14 delivering" element is similar to --

15 THE COURT: Well, let's -- okay. Before we
16 get too confused, you're going through judgments -- or
17 JMOL. You're on the '178 patent. I'm not going to go
18 revisit all of my motions for summary judgment -- or
19 orders on those. So, where are we on the '178 patent
20 JMOL?

21 MR. CORDELL: I think I've got my legs now,
22 your Honor.

23 THE COURT: Okay.

24 MR. CORDELL: We're on the processing means --
25 I do need to make additional motions with respect to the

1 '178.

2 THE COURT: Right. That's where we're at, the
3 '178.

4 MR. CORDELL: So, I'd like to begin with the
5 "processor for continuously delivering" element, which
6 appears on page 9 of the jury notebook set of
7 instructions.

8 THE COURT: Go ahead.

9 MR. CORDELL: And here again, your Honor, it's
10 very similar to the one that we've covered before. The
11 court construed this as a structure that had a sound card
12 and a general purpose computer programmed to perform the
13 algorithm that bridges pages 9 and 10, and we believe
14 there has been no evidence of that. There's been no
15 evidence of its equivalents, particularly with respect to
16 any particularized evidence and linking argument to
17 support equivalents under either --

18 THE COURT: And again this might depend upon
19 if the "sound card" means "a chip" or "a chip" means "a
20 sound card." We're not really talking about equivalents;
21 we're just talking about words meaning the same thing,
22 right?

23 MR. CORDELL: That is one of the
24 possibilities, your Honor.

25 THE COURT: Okay. I'll reserve my ruling on

1 that.

2 MR. CORDELL: All right. And then the
3 construction of "in response to a second one of said
4 control commands" which appears --

5 THE COURT: Page 13?

6 MR. CORDELL: Thank you, your Honor.

7 And we believe that, again, the structure set
8 forth by the court, in particular the general purpose
9 computer programmed to perform the algorithms set forth
10 in the construction, were not addressed by plaintiffs.

11 THE COURT: And again you're not saying that
12 there is not a processor or general purpose computer.
13 You're just saying that the algorithm is not there,
14 right?

15 MR. CORDELL: Correct.

16 THE COURT: Okay. And I'll reserve my ruling
17 on that.

18 MR. CORDELL: Okay. Also the --

19 THE COURT: And is the part of the algorithm
20 you're saying that's missing the fact that the Apple
21 products don't use the LocType and you don't believe that
22 he's identified a proper equivalents by just basically
23 saying it just moves forward?

24 MR. CORDELL: It's the entirety of the
25 algorithm, your Honor. I think the court's instruction

1 on this was actually helpful because we need to focus on
2 the whole algorithm. And when we focus on the whole
3 algorithm, it's not just the lack of a Selection_Record
4 with a LocType. We're missing the process of scanning
5 forward. There needs to be a mechanism to do that scan.
6 You need to scan forward to look for those specific data
7 items, the scanning record and the LocType.

8 THE COURT: Which you are saying is not
9 present in the Apple products?

10 MR. CORDELL: It is not present in the Apple
11 products. I think Dr. Almeroth admitted they're not
12 there.

13 But it's more than that, your Honor. It goes
14 on to -- you have to reset the CurrentPlay variable to
15 the record number of the Selection_Record you find as a
16 result of the scanning process.

17 You then have to fetch the audio program
18 identified by a ProgramID that you found as a result of
19 that scanning process.

20 So, the entirety of that algorithm is just --
21 is wholly silent in this record; and they didn't prove it
22 up either literally or as an equivalent.

23 THE COURT: Okay.

24 MR. CORDELL: And again the same memory
25 argument applies here, your Honor, because the data that

1 Personal Audio says is being used for this process is not
2 in a file. It's not on the disk -- I'm sorry. It's in
3 main memory; and they never go back to the file, to the
4 sequencing file that they have alleged, in order to
5 accomplish this process.

6 I would also like to raise the third element
7 in that same construction, your Honor, which is -- and
8 it's C on page 14.

9 THE COURT: C?

10 MR. CORDELL: Yes. The second one was
11 Number B on page 13.

12 THE COURT: Oh, okay. All right. Go ahead.

13 MR. CORDELL: And then C on page 13. And
14 again the construction is very specific. There is a
15 specific algorithm that's set forth and including a
16 general purpose computer programmed with the algorithm
17 set forth on page 14.

18 THE COURT: Again you're attacking -- or --
19 the algorithm, not the general purpose computer?

20 MR. CORDELL: Correct, your Honor.

21 THE COURT: What part of the algorithm is it
22 that you're saying is not --

23 MR. CORDELL: You know, they did this in terms
24 of -- I believe their evidence on this particular element
25 was functional. They simply said, well, it has these

1 functions; therefore, the algorithm must be as such. And
2 we heard no particularized testimony about the algorithm
3 in the Apple iPods being the equivalent or being
4 insubstantially different or function, way, and result
5 test there.

6 THE COURT: Okay. All right. I'll reserve my
7 ruling on that.

8 MR. CORDELL: Thank you, your Honor.

9 We would now like to move with respect to --
10 we'd like to move for judgment as a matter of law with
11 respect to the doctrine of equivalents on the '178 patent
12 for claims 1, 6, 13, and 14 for all accused products.

13 THE COURT: Isn't that all claims?

14 MR. CORDELL: It is, your Honor; and I
15 believe --

16 THE COURT: Okay. All claims, all products?

17 MR. CORDELL: Yes, your Honor. Thank you.

18 I believe that Personal Audio has restricted
19 itself to arguing equivalents only on the communications
20 port limitation, and therefore we're entitled to judgment
21 as to all other limitations as being not subject to the
22 doctrine of equivalents.

23 THE COURT: Well, how do I -- I mean, I may be
24 getting tired; but I thought the question would be do you
25 find the claim is infringed under the doctrine of

1 equivalents, not are the elements done by doctrine of
2 equivalents.

3 MR. CORDELL: Well, I think what's proper,
4 though, your Honor, is they have to actually identify the
5 element and then they have to tell us -- offer the jury
6 some specific evidence as to that element and then why
7 it's equivalent. I actually had a case a couple of years
8 ago and it was in front of Judge Folsom and he actually
9 put out a verdict form that had the jury identify the
10 element that was subject to equivalents and then they had
11 to fill in the structure that they believed was the
12 equivalent and it --

13 THE COURT: Well, wait, wait, wait, wait.
14 Doctrine of equivalents versus structural equivalents.
15 Your motion, as I understood it, was on doctrine of
16 equivalents.

17 MR. CORDELL: It is.

18 THE COURT: Okay. The jury form on structure
19 is a little bit different than doctrine, isn't it?

20 MR. CORDELL: Well, it could be. It could be.
21 But my suggestion is that actually in this case it
22 wouldn't be because what's required is that the jury has
23 to -- we have to be talking about an element. Whether
24 it's 112 ¶6 or DOE, there is a claim element there; and
25 then we have to have an equivalent for that element. And

1 the rules for finding that equivalent are different
2 depending on which path you take. But in all cases,
3 there is an element; and then there is an equivalent.

4 And one of the fictions, one of the problems
5 in the way we normally do these cases when we put a
6 general interrogatory out to the jury is that the jury
7 will either find infringement or won't find infringement
8 and then we're up at the Court of Appeals trying to
9 deduce what happened and it makes for an opportunity for
10 remand when you wouldn't necessarily need one. And I
11 think the thinking behind --

12 THE COURT: Well, no. They're going to be
13 asked whether it's infringement literal, and they're
14 going to have a separate one on equivalents. I'm not
15 going to be as general as you're suggesting.

16 MR. CORDELL: Well, I think that in this
17 particular case -- it was the Paice/Toyota litigation --
18 your Honor, they took it one step further and for
19 equivalents the jury had to identify -- which meant the
20 plaintiff in closing, which was me at that time -- had to
21 identify what the element was we were arguing equivalents
22 for and then the jury was asked to supply the structure
23 that was the equivalents so that then we could review --
24 the court could review whether there was substantial
25 evidence to support --

1 THE COURT: Okay.

2 MR. CORDELL: -- that equivalents finding.

3 THE COURT: We may -- if you can draft a jury
4 charge that makes some sense, I'll consider it; but I'm
5 not seeing how that's a JMOL issue.

6 MR. CORDELL: Well, so, the JMOL issue here is
7 that we are entitled to JMOL on all elements other than
8 the communications port limitation because that's the
9 only element for which they have adduced any evidence
10 with respect to the doctrine of equivalents.

11 THE COURT: Let me ask Mr. Schutz, then. I
12 have a note here that he did talk about that one under
13 doctrine of equivalents and I don't have a similar note
14 everywhere else. Do I have at least that much correct?

15 MR. SCHUTZ: Yes, your Honor.

16 THE COURT: Okay. I'm not going to grant at
17 this point JMOL on individual elements under the doctrine
18 of equivalents. It might be that a doctrine of
19 equivalents question is only asked on claims 1, 6, and 13
20 since that's the one that's there. But your other
21 suggestion, I think, appears to me to be a jury charge --
22 keeping in mind this jury instruction and verdict form is
23 already going to be pretty complicated. I mean, if you
24 can come up with something logical, and especially if
25 Mr. Schutz and his team agree, I'll certainly consider

1 that.

2 MR. CORDELL: Thank you.

3 THE COURT: Okay. What else then --

4 MR. CORDELL: So, just quickly addressing the
5 one DOE element that they did raise, the communications
6 port limitation, we challenge the sufficiency of the
7 evidence on that. Again, there was no
8 function-way-result analysis. There was no
9 insubstantiality of difference. There was no
10 particularized evidence that was adduced as to those --
11 the elements of equivalents; and, therefore, we believe
12 that judgment as a matter of law is appropriate.

13 We also would renew our request, your Honor,
14 that pursuant to *Festo*, that Personal Audio be denied any
15 range of equivalents with respect to the communications
16 port limitation because of prosecution history estoppel.

17 THE COURT: All right. As to the second one,
18 I'll deny that. I've already granted judgment on that.
19 I'm not going to -- I haven't seen a basis to change.

20 On the request, just to be sure I understand
21 your argument, what you're talking about is you're saying
22 specifically -- so that we can actually know what is in
23 the record. You're saying specifically that hooking up
24 the USB cable is not a request as I have defined that,
25 i.e., a communication to initiate the transfer?

1 In other words -- that's what we're talking
2 about?

3 MR. CORDELL: That's what we're talking about,
4 your Honor.

5 THE COURT: Okay.

6 MR. CORDELL: I think they've admitted that
7 that's not literal so --

8 THE COURT: Right. And what you're saying is
9 that the fact that the USB cable hooks up and says, "Here
10 I am" -- or, in effect, sends out some kind of a "here is
11 a device" signal -- is not a communication to initiate
12 the transfer, right?

13 MR. CORDELL: Correct, your Honor. And it
14 doesn't result in any transfer. The court's construction
15 actually had a clarifying line just after the
16 construction itself that said that a mere -- you know, a
17 mere "Hey, how you doing" communication is not
18 sufficient; and that's been the entirety of their
19 evidence. They only have evidence that there is a USB
20 communication that's established. There is nothing in
21 this record to suggest that that USB communication is
22 what initiates the transfer of information and certainly
23 no equivalents evidence as to that.

24 THE COURT: Okay. And, Mr. Schutz, what
25 should I look at from your point of view if you want me

1 to write the order denying that? What do I look at?

2 What do I cite?

3 MR. SCHUTZ: I'll defer to Mr. Holdreith on
4 that.

5 THE COURT: Okay.

6 MR. HOLDREITH: Yes, your Honor. And just a
7 little guidance, if you're specifically thinking about
8 the law or the transcript or both.

9 THE COURT: I'm thinking about the facts.
10 I've defined this as a "request" means "a communication
11 to initiate the transfer." I've seen in the record that
12 they hook up the USB -- or you could hook up the USB
13 cable. I think it's been pretty well established that
14 there is a voltage drop. The computer knows now that the
15 player is attached and *iTunes* then goes ahead and starts
16 to download. I believe there's been testimony that it
17 has to be able to distinguish between a player wanting
18 music and a player wanting movies. But if you were
19 drafting the order for me, what parts of the transcript
20 or which pieces of evidence do I include in there or
21 would you suggest I include in there to say, "Oh, yes,
22 this is, in fact, a communication to initiate transfer"?
23 MR. HOLDREITH: Yes, sir. So, Dr. Almeroth's
24 testimony is one of the things we're relying on; and he
25 testified about that. I'm not sure if I have

1 comprehensive cites. We just went through this last
2 night. But it's around page 954 of the transcript --

3 THE COURT: Okay.

4 MR. HOLDREITH: -- and it runs through about
5 page 964, I believe.

6 THE COURT: Okay.

7 MR. HOLDREITH: There's also some further
8 testimony on that point at about page 1358 of the
9 transcript as well.

10 The evidence that Dr. Almeroth adduced on that
11 point is that --

12 THE COURT: Well, if you just give me the page
13 citations, I can look at those.

14 MR. HOLDREITH: Yes, sir.

15 THE COURT: So, I've got page 1358. What
16 else?

17 MR. HOLDREITH: I believe those were the pages
18 that we are primarily indicating to the court.

19 And then there is, your Honor, some evidence
20 in that IrDA article, "IrDA: Past, Present, and Future."
21 And I apologize. I think it's Plaintiff's Exhibit 346,
22 but I might have that one wrong.

23 I believe Dr. Almeroth testified that there is
24 some discussion of a request over IrDA and what that
25 means with reference to that exhibit. I can elaborate if

1 the court wishes, but those are the record cites.

2 THE COURT: And, so, nobody else but
3 Dr. Almeroth?

4 MR. HOLDREITH: That is the evidence we're
5 relying on, your Honor.

6 THE COURT: Okay. I'm going to reserve my
7 ruling on that.

8 MR. CORDELL: Thank you, your Honor.

9 We believe that Apple's entitled to judgment
10 as a matter of law that Personal Audio has not proven a
11 priority date before the filing -- before October 2nd,
12 1996.

13 THE COURT: Is there any attempt to go more
14 than a year prior to filing date?

15 MR. SCHUTZ: Your Honor, we're not aware of
16 any intervening art unless they're going to surprise us
17 with something. But the expert reports on validity -- is
18 there something?

19 MR. HOLDREITH: May I be heard on that?

20 THE COURT: That's what I'm asking. I don't
21 remember any effort to show anything prior to -- you
22 know, a year prior to the application. I don't remember
23 any other --

24 MR. HOLDREITH: Mr. Call testified about early
25 drafts of the patent application and I believe we put

1 into evidence --

2 THE COURT: Do we have any dates or anything?
3 Is it corroborated?

4 MR. HOLDREITH: Oh, yeah. It was drafts of
5 the patent application that were dated that he testified
6 to.

7 MR. SCHUTZ: I misunderstood your question,
8 your Honor, yes. We did, in fact, put that evidence in
9 establishing an earlier --

10 THE COURT: Could you give me the exhibit
11 numbers? I must have missed the date on that. I thought
12 that --

13 MR. SCHUTZ: We'll get those for you, your
14 Honor.

15 MR. CORDELL: I believe those were undated,
16 your Honor.

17 THE COURT: All right. Well, I'll tell you
18 what. On that one, assuming that you now have -- that
19 you can get in some undisclosed piece of prior art that
20 was predated or something like that and this actually
21 becomes an issue, in the meantime I need from you the
22 evidence that you would -- when I say "you," I need from
23 Personal Audio the evidence Personal Audio would have
24 that would establish this earlier date.

25 I hadn't had that on my radar really. But if

1 you've got something in earlier, you need to show it to
2 me. I just don't recall anything earlier than a year.

3 MR. HOLDREITH: And, your Honor, the only
4 reason this could become an issue is if that MIT thesis
5 were to come in. I think the court has ruled that it's
6 out, but I just received a binder this morning suggesting
7 that they want to use it.

8 THE COURT: Well, I think my ruling was a
9 motion *in limine* that evidentiary problems were there. I
10 have not said it's not coming in. It might not, but it's
11 going to depend on how -- I mean, what evidence there is
12 to get it here.

13 Okay. What else?

14 MR. CORDELL: Your Honor, we believe Apple --

15 THE COURT: I'll reserve my ruling on that
16 one, first of all to see if it even becomes a relevant
17 issue.

18 MR. CORDELL: We believe that Personal Audio
19 is not entitled to damages prior to June 5, 2001, due to
20 its failure to mark the Gotuit SongCatcher product.
21 There is evidence that the product downloads songs off
22 the radio, could skip forward and backward, create a list
23 of scrollable songs, had a user interface in the form of
24 a keyboard and an admission by Mr. Logan that the
25 SongCatcher product was never marked with the

1 '076 patent.

2 THE COURT: Whose burden of proof is it to
3 show that the patentee or the patent holder licensed,
4 authorized, or itself distributed something after the
5 patent was issued? Now, I understand it's their burden
6 to show -- but in most of these cases it's uncontested.
7 You've got all of these articles out there, and then
8 they've got the burden.

9 But what about the initial burden? I mean,
10 surely you couldn't just start saying, "Oh, yeah, there
11 were some products out there. No, we're not going to
12 bring any of them in. We're not actually going to
13 establish that they were your products. There was just
14 some products somebody had."

15 MR. CORDELL: Your Honor, may I have
16 Mr. Stephens address that?

17 THE COURT: Sure.

18 MR. STEPHENS: Your Honor, I think we've put
19 in a fair amount of evidence that Gotuit actually was
20 authorized to manufacture products under the patent.
21 They put the patents under their Web site, said they were
22 the sole licensing agent for the patents. And, so, I
23 think we've laid the foundation for there being -- for
24 Gotuit being authorized to distribute the product.

25 At that point I believe the burden shifts then

1 to the patent owner to prove that the authorized
2 manufacturer of the product, in fact, marked it.

3 THE COURT: Okay. All right. I'll reserve my
4 ruling on that.

5 MR. CORDELL: Turning to damages, your
6 Honor --

7 MR. HOLDREITH: Your Honor, I'm sorry to
8 interrupt, counsel. There's something I forgot to
9 mention in connection with the record we're relying on
10 for the request, if I may just make a quick addition
11 before we move to damages.

12 THE COURT: All right.

13 MR. HOLDREITH: The case of *Paice versus*
14 *Toyota*, which is Mr. Cordell's case that he mentioned, is
15 found at 504 F.3d 1293.

16 THE COURT: Okay.

17 MR. HOLDREITH: And at page 1305 that case
18 indicates that when a jury is considering the doctrine of
19 equivalents analysis, they can consider the expert's
20 testimony as a whole. You don't have to just pick it up
21 at a particular point. And they can consider his
22 explanation of how he did the equivalents analysis in
23 other parts of the testimony.

24 So, my understanding is the challenge was
25 there is no particularized testimony. Those are the

1 record cites I gave you as the particularized testimony.

2 If Apple is arguing that he didn't explain how
3 to do a doctrine of equivalents analysis, what the
4 methodology is, we would rely on his entire explanation
5 of his methodology.

6 THE COURT: Okay.

7 MR. CORDELL: Having lived through that case,
8 your Honor, I can tell you that the Court of Appeals
9 demanded that I show them particularized testimony.

10 THE COURT: Okay.

11 MR. CORDELL: It was a difficult argument.

12 Turning to damages, your Honor, we believe
13 that Apple is entitled to a judgment as a matter of law
14 that Personal Audio is not entitled to a hypothetical
15 negotiation date of October, 2001. And this is
16 significant because recall that the entirety of
17 Mr. Nawrocki's analysis, at least with respect to when
18 both patents were being negotiated -- the entirety of his
19 analysis was premised on this October, 2001, date; and he
20 gets that from the notion that Personal Audio has that
21 that's when infringement began, in 2001.

22 However, your Honor, there is no evidence in
23 this record that any product sold in October, 2001,
24 actually infringes. What's happened is that because of
25 the limitations period in the statute, Personal Audio

1 stopped at 2003. They only began to prove up
2 infringement with respect to the products that were
3 introduced starting with Generation 3 of the iPod
4 classic. Therefore, there is a gap. And there was
5 evidence that those products are different, and there is
6 a gap with respect to Generations 1 and 2 for which
7 Dr. Almeroth and really no witness has offered any
8 testimony with respect to those products either being
9 infringing or noninfringing. And, so, with that, your
10 Honor, we believe that they are not entitled to that
11 October, 2001, hypothetical negotiation date.

12 THE COURT: Well, they haven't asked for
13 damages for the first two versions, either, have they?

14 MR. CORDELL: They have not.

15 THE COURT: Okay.

16 MR. CORDELL: But it's a flaw in
17 Mr. Nawrocki's opinion. And my next motion will be that
18 the court not consider his opinion because it is now --

19 THE COURT: Well, I'm going to overrule the
20 date. I believe the cases state that that's when the
21 hypothetical negotiation occurs, is the date of first
22 infringement, although the damages may start later on.

23 So, I'm going to overrule that part of the
24 motion.

25 Okay. What's the next --

1 MR. CORDELL: Well, my next motion is to ask
2 the court to disregard as a matter of law Mr. Nawrocki's
3 testimony because there was no evidence that that is, in
4 fact, the proper hypothetical negotiation date. There is
5 no evidence to support his position that infringement
6 began in 2001. They simply didn't prove up those early
7 iPods one way or the other.

8 THE COURT: I'm going to overrule that.

9 MR. CORDELL: Next, Apple maintains that it is
10 deserving of judgment as a matter of law because Personal
11 Audio has not proved it is entitled to a running royalty
12 in this case.

13 Its expert and other witnesses testified on
14 damages, but they did not provide sufficient testimony
15 based on reliable economic or historical data to show
16 that Personal Audio and Apple would have agreed to a
17 running royalty. This includes Mr. Nawrocki offered only
18 conclusory statements about what Mr. Logan would or would
19 not have wanted, but he did not cite any supporting
20 evidence.

21 Personal Audio has also relied on an
22 irrelevant component level profit margin forecast to
23 suggest a running royalty. Mr. Nawrocki speculated that
24 Apple would have entered into a running royalty because
25 of some weakness in the company. There was no evidence

1 that weakness translates into running royalty, and this
2 is conclusory evidence and is simply insufficient to
3 support a running royalty.

4 THE COURT: All right. And this, I think,
5 gets into a number -- or much of the confusion that has
6 developed over damages arising out of the *Georgia-Pacific*
7 case, which I take as an attempt by that judge to very
8 carefully go through the factors he considered in -- as
9 applied here to more traditional royalty-type analysis.
10 Certain of the factors do look at the actual plaintiff
11 and actual defendant in the case because obviously if the
12 defendant had an established policy, as in Factor 4, that
13 would be relevant. Or, for that matter, the rates paid
14 by licensee, Factor 2, that would be relevant.

15 However, overlying all of this is Factor 15,
16 the amount that a licensor such as patentee and a
17 licensee such as infringer, which I take to be the
18 reasonable licensee, reasonable licensor. And the idea
19 that someone can go around stealing intellectual property
20 and avoid any damages of any kind by just simply never
21 licensing anything makes no sense. And that's the
22 logical extension of your argument. I'm not saying
23 that's what you're arguing.

24 But to say that someone has to come up with at
25 least one license that the defendant has ever entered

1 into I don't think is correct. And it's almost clearly
2 incorrect because by its very nature, if you take it that
3 it has to be a license for the exact same technology --
4 because, by definition, patented technology is unique,
5 you have to be talking about comparables.

6 So, if your point is that, well, there was no
7 precise comparable or no precise time that Apple has ever
8 licensed something in the past -- or paid for something
9 in the past and, so, therefore they would never do it in
10 the future, that ignores the reasonable licensor,
11 reasonable licensee factors which can be considered.
12 And, so, I think it is appropriate and, in fact, in many
13 cases there would be no other way than to look at what a
14 reasonable licensor and a reasonable licensee would do in
15 this kind of case.

16 To that extent, I'm going to overrule your
17 motion on that ground.

18 MR. CORDELL: Thank you, your Honor.

19 We also believe that Apple's entitled to
20 judgment as a matter of law because Personal Audio has
21 relied at least in part on the entire market value rule
22 without adducing the necessary predicate. Its expert,
23 Mr. Nawrocki, testified as one of the checks in his
24 analysis that his damages number would be 3 percent of
25 the total iPod profits. The law is very well established

1 about what hoops you have to jump through in order to
2 rely on the entire market value rule. Mr. Nawrocki did
3 not do that; and, therefore, we should get judgment as a
4 matter of law that no such damages should be awarded.

5 THE COURT: I don't remember on direct him
6 saying -- or trying to bring up that as a check. Where
7 was that in the transcript where he said that?

8 MR. CORDELL: 1533 to 1534.

9 THE COURT: And who was questioning him at the
10 time?

11 MR. CORDELL: It was on cross, your Honor.

12 THE COURT: And, so, what you're saying is on
13 cross if a defense lawyer says, "That works out to
14 3 percent, doesn't it?" and that's obviously a numerical
15 number and he says, "Yes" and then she says, "Aha," under
16 the recent case you lose because you've admitted that
17 3 percent of the calculation. I mean, that can't be the
18 rule. I'll have to go back and look at the precise
19 question and -- but to be brought out by defense counsel
20 is a little bit different than saying that that's what he
21 used. And I'm not saying she didn't do a very good job
22 in cross-examining because she did, but I don't remember
23 that as catching my mind as "uh-oh."

24 MR. CORDELL: Just to finish it out, your
25 Honor, this was the part where she was discussing with

1 Mr. Almeroth sort of the substantiality of his royalty
2 calculations.

3 THE COURT: Okay.

4 MR. CORDELL: I think she was challenging him
5 as it was too high and, so, he, as a justification, sort
6 of said, well, but it's really only 3 percent of the
7 profits; so, it's really not too high. But I take the
8 court's point, and I'll await the court's ruling.

9 THE COURT: Okay. And that page number again
10 was?

11 MR. CORDELL: 1533 to -- it bridges to 1534.

12 THE COURT: Okay. I'll take a look at that.

13 MR. CORDELL: I'd now like to move for
14 judgment as a matter of law that Personal Audio is not
15 entitled to damages because it is asking for 100 percent
16 of the profits attributable to the patented feature. The
17 cases of late have been quite clear that there are two
18 things that have to happen here. You have to apportion
19 the revenues or profits attributable to a particular
20 product so that you can identify exactly what is
21 associated with the patentable feature and that then is a
22 starting point for the royalty analysis and then the
23 determination becomes what portion of the profit
24 attributable to that patented feature --

25 THE COURT: Do you have any case that stands

1 for the proposition that after you've gone through that
2 exercise -- and I think he went through the exercise of
3 apportioning it based on the surveys; and I'm not sure
4 what better way you could have, given that there were a
5 number of surveys by Apple supplemented by that one by
6 Dr. Stewart [sic] -- that if it was a very low number
7 like this, he couldn't get a hundred percent if it's
8 justified by its contribution?

9 I mean, I understand you've got to do both;
10 but let's say that I find that I think he's gone through
11 the process of attribution -- and I raised that issue I
12 think in one of my orders. How is he going to justify a
13 hundred percent? Do you have a case that says, no, you
14 can't get all 90 cents.

15 MR. CORDELL: I think that's what *Uniloc*
16 stands for, your Honor. I think the *Uniloc* decision that
17 came out a year and a half or so ago, I think that's
18 exactly what it says.

19 THE COURT: Okay.

20 MR. CORDELL: And the thing that makes it
21 particularly difficult is that when you do the
22 apportionment down to the portion of the technology
23 that's attributable to the patented feature, what
24 rational hypothetical negotiator would say, "Okay. I'm
25 going to go ahead and buy that technology. I'm going to

1 pay for it, and I'm going to give you a hundred percent
2 of what I expect to make on it. I'm going to take all
3 the risk. I'm going to take all the burden. I'm going
4 to do all the things that I have to do to create a
5 product out of that technology, and I'm going to return
6 to you a hundred percent of the profits"?

7 THE COURT: Well, that's -- and the
8 hypothetical I could think of very quickly off the top of
9 my head is it is, in fact, important. All my surveys
10 show that it's something they demand and the actual cost
11 is very cheap, especially if I compare it to the profits
12 I intend to make and rather than waste time haggling over
13 nickels and dimes, a reasonable licensor might very well
14 say, "Heck, take your 90 cents and get out of here. Give
15 us that patent."

16 I mean, I'm not saying that would happen; but
17 to say it would never happen or how a reasonable person
18 could never do it I think is inappropriate. Now, I'm not
19 saying the higher courts might have a hard -- might in
20 the future draw a bright-line rule it could never be a
21 hundred percent, it always has to be at least 99. I
22 haven't seen that yet.

23 MR. CORDELL: Well, let me try it this way,
24 your Honor, because I'm a bit of a damages historian.
25 I'm a very exciting guy.

1 And the reality is that there was a time in
2 patent law when there was a principle called
3 "disgorgement of profits." It was like a trademark
4 principle in the current trademark statute. And 284 was
5 amended to take away disgorgement of profits, and it went
6 instead to this reasonable royalty.

7 And, so, the idea that the court just
8 articulated may, in fact, exist; but I would suggest that
9 means you probably take a higher royalty because you
10 would recognize it and for the nickels and dimes reasons
11 and everything else. But a hundred percent?

12 And in this case if you look at Mr. Nawrocki's
13 range, he actually starts down at 60-something cents.
14 And if he's right about the profitability, that range, if
15 he's at the low end of that range, it's like 144 percent
16 royalty. I did the math.

17 THE COURT: Okay. I think I addressed this
18 issue earlier. I think, though, a higher court, though,
19 will have to say as a matter of law they can't have a
20 hundred percent. And the arguing of whether they should
21 get 60 or a \$1.30 or 90 is something that -- well, you're
22 going to be addressing that to the jury to some degree,
23 along with, I guess, your lump-sum argument. So, as far
24 as that, I'm going to overrule that.

25 MR. CORDELL: We also challenge the damages on

1 evidentiary basis that Mr. Nawrocki's opinions were not
2 tied to specific credible evidence, that the survey that
3 he relied on wasn't directed to the actual patented
4 inventions, that he relied on unproven licenses and
5 misleading royalty forecasts and that he -- and that he
6 relies on significantly more than the extent of use as he
7 reflected in his survey evidence. So, we challenge --

8 THE COURT: The extent of use what?

9 MR. CORDELL: His opinion adding a per-unit
10 royalty for every unit sold, he rationalized by saying
11 that there was something having to do with the extent of
12 use. It's a theory that you see from damages experts
13 sometimes but we believe is unproven, unreliable.

14 THE COURT: Okay. Based upon the many surveys
15 he relied upon, including Stewart's *[sic]*, and based upon
16 the testimony today of Mr. Ng, I think it has been well
17 established that one could attribute importance to the
18 features of the invention, I mean, assuming they actually
19 used it, which he had to, and assuming they're valid,
20 which he had to. I think he's gone far beyond a simple
21 survey by one paid expert; namely, Dr. Stewart *[sic]*.
22 He's used a lot of Apple's own documents; and we heard
23 Mr. Ng today go on at some length supporting very heavily
24 his position as to what Apple thought was important, the
25 ability to download or sync and the ability to easily

1 navigate. So, I will -- I'm going to overrule that. I
2 think that, he has covered.

3 MR. CORDELL: And just a couple more, your
4 Honor. We challenge Personal Audio's damages on the
5 basis that Mr. Nawrocki included elements that are not
6 part of the accused devices.

7 THE COURT: Which are?

8 MR. CORDELL: In particular, yesterday when he
9 was testifying, he put up a chart and he had playlists up
10 twice on the chart and I passed a note to Ms. Hunsaker
11 and said, "How can he double-dip?" And he clarified and
12 said, "I'm not double-dipping. One of those playlists is
13 the creation of the playlist on *iTunes*, and the other is
14 the use of the playlist on the iPod." And roughly a
15 third of his damages were attributable to *iTunes*, your
16 Honor. That's an unaccused product. It gets back to the
17 indirect infringement case that they have not brought,
18 and they are not entitled to damages on that basis.

19 THE COURT: And how do I deal with that from
20 Personal Audio's -- Ms. Huang or Mr. Schutz?

21 MR. SCHUTZ: Your Honor, the playlists that he
22 broke apart was playlist syncing and playlist navigating;
23 and the playlist syncing part has to deal with
24 downloading playlists. I mean, the invention is an audio
25 player with the capability to download or receive

1 navigable playlists. And so -- and then once you have
2 them, you can obviously move through them.

3 And that was clarified, I think, on
4 cross-examination on some of that; but that is -- because
5 it wasn't just playlists. It was playlist syncing. And
6 the source of the playlist is *iTunes*. The source could
7 be anywhere, but the fact of the matter is that the
8 ability to receive the playlists and that's one aspect of
9 it. The other aspect of the playlist is you can maneuver
10 through them once you have them on the audio player.

11 THE COURT: Okay. And the testimony that he
12 gave or seemed to give at various points -- and I don't
13 have it memorized -- as to the playlist creation, I think
14 was the term he used, how do I deal with that?

15 THE REPORTER: Judge, I'm going to need a
16 break pretty soon.

17 THE COURT: Okay. I'm sorry. I forgot.

18 We need to take a break. How many more of
19 these do you have?

20 MR. CORDELL: I'm down to two, your Honor.

21 THE COURT: Okay. Well, this is important.
22 Why don't we go ahead and we're going to take a break
23 until 2:00 and I'll find out if Chris' fingers have
24 recovered yet. We'll be in recess.

25 (Recess, 1:36 p.m. to 2:01 p.m.)

1 (Open court, all parties present, jury not
2 present.)

3 THE COURT: All right. So, Personal Audio,
4 you're satisfied with the way the evidence is on that
5 damage issue?

6 MR. SCHUTZ: Do you want me to point out for
7 the record --

8 THE COURT: No. I'm just saying you're
9 satisfied with the way it is?

10 MR. SCHUTZ: Yes.

11 THE COURT: Okay. And you said you had two
12 more points on damages, I think.

13 MR. CORDELL: I did, your Honor.

14 In extension of the last point which was about
15 the unaccused *iTunes* playlists to access their music,
16 that we believe that Personal Audio has included
17 unaccused items within their damages calculation without
18 laying the proper predicate for convoyed sales. And, so,
19 there is a legal rubric they're supposed to go through if
20 they're --

21 THE COURT: Isn't that the same as the one you
22 just made?

23 MR. CORDELL: It's slightly --

24 THE COURT: Bringing in *iTunes*?

25 MR. CORDELL: It is, your Honor.

1 THE COURT: Okay.

2 MR. CORDELL: But it has to do with convoyed
3 sales.

4 THE COURT: Well, there's -- okay. Go ahead.

5 MR. CORDELL: And then finally, your Honor,
6 this is a little bit complicated; so, I apologize. But
7 in this case there are only apparatus claims -- as if my
8 prior motions haven't been. And Apple moves for judgment
9 as a matter of law that Personal Audio is not entitled to
10 damages -- or at least that should be remitted -- as a
11 result of their expert and their other evidence not
12 taking into account the fact that these are apparatus
13 claims and their damages evidence is premised upon use of
14 the products.

15 The court has seen all of this evidence about
16 surveys and we've heard lots of evidence from the fact
17 witnesses about certain features that are used sometimes
18 and not others and yet -- and the damages case is
19 premised on that usage data; and, yet, there has been no
20 accounting or apportionment of the damages to reflect
21 that these are apparatus claims, not method claims. So,
22 there is just one plum in the pie; and this effort to
23 exact a reasonable royalty on the basis of use of the
24 products is improper.

25 THE COURT: All right. I think that's almost

1 frivolous. The usage surveys and so forth were the
2 method that he used -- the expert used to apportion what
3 value the assumed infringed and assumed valid patented
4 inventions contributed to the product and then he based
5 it on a per-unit, not per use of the unit but per unit.
6 So, I'll deny that.

7 MR. CORDELL: Thank you, your Honor. And that
8 concludes our motions for --

9 THE COURT: All right. Are you ready to go
10 forward with infringement -- or who is your first expert
11 or first witness?

12 MR. CORDELL: Well, right at this point we
13 would be calling by video Dan Goessling.

14 THE COURT: All right. Please bring in the
15 jury.

16 It would be helpful if by the end of all of
17 the evidence -- because we know we're going to see these
18 same JMOLs raised again -- if you would go through the
19 transcript over the next few days and supply the
20 transcript references where you think evidence was
21 brought in to deal with each of these issues.

22 MR. HOLDREITH: Yes, sir.

23 THE COURT: In other words, you're claiming
24 you did put in the evidence to cover all the things that
25 they say you didn't. All right. Show me. I don't need

1 briefing. I don't need law on most things. What I want
2 are the transcript references that you think -- and I
3 don't want page 1 to 5,000, either. I mean, I want
4 specific, specific ones as to each of these arguments.
5 Now, some of them may wind up being very similar to the
6 same on the means-plus-function.

7 MR. HOLDREITH: I understand, your Honor.

8 THE COURT: I want to see what you're saying
9 is your best argument.

10 MR. HOLDREITH: We'll submit that the day
11 before.

12 (The jury enters the courtroom, 2:09 p.m.)

13 THE COURT: Ladies and gentlemen, at this
14 point the -- Personal Audio is considered to have rested.
15 I mentioned before that I had to go through a bunch of
16 motions and deal with arguments on both sides. It took a
17 little bit longer than normal but everything in this case
18 has been a little bit complicated and I understand y'all
19 had cheesecake. So, hopefully it gave you something to
20 do while we were slogging through all of that.

21 Now, at this time the defense, Apple, will
22 start putting on their case.

23 MR. CORDELL: Thank you, your Honor. May I
24 make a brief interim statement?

25 THE COURT: You may.

1 MR. CORDELL: Good afternoon, ladies and
2 gentlemen. You're now going to hear from the third
3 inventor on these patents -- there were three -- and it's
4 a fellow by the name of Dan Goessling. He lives up in
5 Massachusetts, and he's no longer associated with
6 Personal Audio. So, neither of us could bring him here
7 to trial. Instead, we're going to show you his testimony
8 by video. So, you're going to see his deposition.

9 I want you to listen to his evidence because I
10 think you're going to get a couple of facts out of it.
11 He's going to tell you right up-front that Personal Audio
12 did not invent playlists. He's going to just testify it.

13 He's going to say that radio stations had
14 playlists before Personal Audio came along. So, all this
15 time and attention we've spent on playlists, you're going
16 to hear one of the inventors tell you that that wasn't
17 their invention.

18 He's going to say they didn't invent
19 downloading. He's going to say that existed before they
20 came along, another important part of this.

21 He's then going to talk about a piece of prior
22 art called the "Sound Blaster." You haven't heard much
23 about that. I'm sorry if it's a little confusing but
24 we're having to do this by video but you'll see the
25 evidence that this is and he actually talks about the way

1 the Sound Blaster prior art relates to his patent and
2 whether or not they're associated with each other.

3 And then finally he's going to say he visited
4 a thing called the "National Association of Broadcasters"
5 in Las Vegas. And I bring that up because you're going
6 to hear another one of the witnesses a little later,
7 Eugene Novacek, who's going to testify about what he
8 showed at that National Association of Broadcasters
9 meeting in Las Vegas.

10 With that, I thank you for your attention; and
11 we'll play the video for you.

12 MR. SCHUTZ: Your Honor, we counter-designated
13 deposition testimony from Mr. Goessling as well. So, I,
14 too, would like to make a brief interim statement.

15 THE COURT: All right. You may.

16 Go ahead and pull it down.

17 Again, ladies and gentlemen, as I mentioned
18 before, both sides were at the deposition. Like in the
19 last deposition, both sides can put in what they want
20 played; and I've told them to keep out, as much as
21 possible, the things that are repetitive, argumentative,
22 objectionable so you don't have to waste time looking at
23 it.

24 Go ahead.

25 MR. SCHUTZ: Thank you, your Honor.

1 Ladies and gentlemen, Dan Goessling was
2 subpoenaed by Apple to give a deposition in this case.
3 He has not worked for Personal Audio since 1996 when the
4 patent application was filed.

5 You will hear Mr. Goessling talk about the
6 work he did and the specific commercial product that he
7 was working on to deliver personalized audio programs to
8 a player that you could take with you in your car.
9 You've heard Mr. Logan talk some about that.

10 Now, during this deposition, Apple showed
11 Mr. Goessling a document that he had never seen before
12 about a product called "Sound Blaster." And you heard
13 Mr. Cordell mention that. And this Sound Blaster
14 product, the experts in this case agree, could not
15 receive or download navigable playlists. And when he was
16 in the deposition looking at this document, they asked
17 him a number of questions about whether he invented what
18 was in that document; and of course he said no because he
19 did not invent Sound Blaster.

20 He helped invent the total system disclosed in
21 the patent, including the player claimed in the patent.
22 When they asked these questions, you should also watch to
23 see if they show him any source code or the judge 's
24 claim construction. Also, later in the deposition you
25 will hear him say when he saw the Genius Playlists and

1 podcasts he thought that sounded a lot like what he was
2 working on back in the Personal Audio days. Thank you
3 very much.

4 (The following testimony is presented via
5 videotape.)

6 DEPOSITION TESTIMONY OF DANIEL F. GOESSLING

7 Q. Good morning, Mr. Goessling. Thank you for coming
8 today. Could you please state and spell your name for
9 the record?

10 A. My name is Daniel F. Goessling, D-A-N-I-E-L and
11 the last name is G-O-E-S-S-L-I-N-G.

12 Q. Mr. Goessling, the court reporter has handed you
13 Exhibit 1 which is U.S. Patent Number 6,199,076. Do you
14 have that in front of you?

15 A. 6,199,076, yeah.

16 Q. And you're the Daniel F. Goessling that's listed
17 as an inventor; is that right?

18 A. That's right.

19 Q. Does this refresh your recollection about what
20 invention -- I'll represent to you, I guess, before I ask
21 that question, that this is one of the patents that's
22 being asserted against Apple and Cirrus in this lawsuit.
23 Does this refresh your recollection about what it is you
24 invented that's at issue in this case?

25 A. Well, it doesn't -- I see these terms. I know

1 that I worked on those terms back when I worked at
2 Personal Audio. It's -- this particular patent, I'm
3 going to have to read it to really remember. This is --
4 we did a bunch of patents.

5 These terms look like it's from some of the
6 stuff I worked on.

7 Q. And did you understand that to be an invention?

8 A. I understood it to be a product. I've learned
9 since that "invention" is kind of a patentee term; and,
10 so, I don't know what that really means --

11 Q. So, you don't --

12 A. -- to you. Well, I thought it was -- I thought it
13 was new technology and that we were doing pretty good
14 stuff.

15 Q. So, you -- it was a subscription service and you
16 would have this beamer device connected to your PC and
17 that would download content from your server and then
18 transmit that to a device in your car that you would then
19 use to listen to the content on your way to work, for
20 example; is that right?

21 A. Well, you could conceivably -- not quite, though.
22 As I recall the -- you could do everything on your PC if
23 you haven't -- for some reason you wanted this and you
24 weren't interested in listening in your car, you
25 didn't -- the beamer device did not download the device

1 from the server, just some software you'd put on the PC
2 went to the server over the Internet to get this stuff.
3 If you had the car -- if you wanted to listen to it in
4 your car, what we felt had to happen was you needed this
5 beamer device to get the data from the PC that lived in
6 your house into your car. So, the beamer was a shortwave
7 radio device; and then there was a player, another device
8 in the car that got signals from the beamer.

9 Q. And the device in the car was something called a
10 "car PC"; is that right?

11 A. Well, it was -- I don't want to call it a "car PC"
12 because it wasn't -- I mean, there were car PCs at the
13 time that sort of ran *Windows* and looked like a PC. This
14 was going to be some sort of special -- you'd call it an
15 "embedded device" now. It was going to be its own thing.
16 We weren't making any promises that it was going to be
17 a -- recognizable as a PC.

18 Q. But right now I'm just asking for your
19 recollection about what it was you worked on.

20 A. Well, what we were -- concretely what we were
21 working on most of the time I was there was a -- we had
22 a -- we called it the "prototype player." The prototype
23 player was a visual Basic program that ran on a PC where
24 we experimented with different UI arrangements.

25 Q. And that was --

1 A. So, we'd fool around with what the buttons -- I
2 don't think we ever had more than six or so of that kind
3 of thing.

4 Q. So, you actually created a software prototype
5 player?

6 A. Right.

7 Q. Now, you mentioned that your ideas were mostly
8 about news and voice. Why was that?

9 A. I don't really know, you know. I think it's
10 because Logan and I listened to NPR in the morning or
11 something like that.

12 Q. So, beyond the fact that you and Mr. Logan both
13 liked to listen to NPR in the morning, you don't know of
14 any other reason why you focused on news and voice for
15 your service?

16 A. No.

17 Q. What did you envision the user experience would be
18 like when they got in the car? They turn on your player.
19 What do they have to do next to listen?

20 A. Well, it was supposed to be like turning on the
21 car radio. I think you turn on the player and push
22 "start," you know, push some "play" button; and it would
23 start. It would be like a customized radio show. So,
24 something would be announced saying "And now here's the
25 segment on how to give a deposition" and would go on. If

1 you didn't like that segment, you could go on to the next
2 one.

3 Q. I see. So, basically like a radio, you turn it on
4 and it starts playing but you would have the ability to
5 skip forward or --

6 A. Right.

7 Q. -- to another segment.

8 But I'm trying to understand how that differs
9 from the just "skip to the next track" button that a CD
10 player also had.

11 A. Well, if you did what you described with the
12 one-level controller and with -- what we wanted to do,
13 you'd have an article with, you know, 50 tracks. You'd
14 have to do 50 little jumps because it wouldn't know
15 anything about the hierarchy, where we might be able to
16 do it in two jumps because you'd skip all the detail and
17 get to a different topic.

18 Q. So, again, I'm just trying to understand how the
19 user would interact with it. You'd have a button that
20 would skip paragraphs and another button that would skip
21 entire articles, let's say?

22 A. That might be -- I think that's one thing we
23 tried.

24 Q. Okay. So, you'd, in effect, have two "skip
25 forward" ones, one for skipping a whole article and one

1 for skipping a paragraph; is that right?

2 A. I think that's one way we tried to do it.

3 Q. Okay. Any other ways that you recall?

4 A. I don't think so.

5 Q. Well, you think it's possible you did invent the
6 playlist?

7 A. Well, we invented this metadata thing to index
8 into the material, I think. And if that's a playlist, we
9 invented a kind of playlist.

10 Q. I guess I'm asking a more fundamental question. I
11 mean, we've provided prior art in this case that shows,
12 in fact, you didn't invent the playlist, that it was
13 around for years before you guys did the work that you
14 did. Does that surprise you at all?

15 A. That does not surprise me.

16 Q. So, I --

17 A. I mean, we visited -- we visited radio stations,
18 and it was clear that they had machines that did
19 playlists. We visited automated radio stations.
20 Certainly what they had was a playlist.

21 Q. Do you recall the names of any of the software
22 they were using?

23 A. No.

24 Q. Ever remember seeing a software called "digital
25 audio delivery," or "DAD"?

1 A. No.

2 Q. Or I want to say "radio computing systems,"

3 "RCS" -- I may have what that stands for wrong, but there
4 was a company called "RCS." Does that ring a bell?

5 A. Not really.

6 Q. They made a product --

7 A. I mean, we -- as I said, we visited some radio
8 stations; and there were -- they talked about their
9 automation. That might have been one of them but...

10 Q. Okay. But you'd agree that you didn't invent the
11 basic notion of automatic playlists that on a computer
12 system would allow you to play multiple audio files in
13 succession, right?

14 A. I know we didn't invent what we saw at the radio
15 stations.

16 Q. Do you remember the names of any of the radio
17 stations that you visited?

18 A. No, I don't remember the names. It was a -- it
19 was a country station in Boston, I think in the
20 Prudential Center. There's not too many of those.

21 Q. Do you remember any other radio stations?

22 A. It was the radio station with Lauren and Wally.

23 Q. We were talking before the break about the
24 software you were developing for the audio player back in
25 1996 that led to the disclosure of the patent 6,199,076

1 in Exhibit 1, right? And you mentioned that the audio
2 and other information that was going to be transferred
3 from the server to the PC player was transferred over the
4 Internet; is that right?

5 A. Right.

6 Q. How did you plan on doing that?

7 A. At the time we planned to do it over a dialup
8 modem.

9 Q. And what kind of software were you going to use to
10 transfer the audio files?

11 A. We hadn't worked it out exactly; but it was going
12 to be file transfer -- FTP or some UNIX-type utility.

13 Q. "FTP" stands for "file transfer protocol"?

14 A. I think so.

15 Q. And that was Internet protocol for moving files
16 from a server to a client; is that right?

17 A. Yeah.

18 Q. And that's something that had been around for a
19 while?

20 A. Yeah, a long time.

21 Q. And that was a program that was available on
22 *Windows 95*; is that right?

23 A. It must have been. I mean, it was everywhere. It
24 was...

25 Q. And similarly, *Windows 95*, at the time you were

1 working on this and even before in 1995, could be used to
2 connect to the Internet and use FTP to transfer files,
3 right?

4 A. Sure.

5 Q. Do you remember one for *Windows 95* called the
6 "Sound Blaster 16"?

7 A. No.

8 Q. Exhibit 3 is a user's guide for *Windows 95* for the
9 Sound Blaster 16 sound card by Creative Labs. Do you see
10 that?

11 A. I see it.

12 Q. Does that refresh your recollection about whether
13 or not there was software available on the market before
14 you got involved in the player project with Mr. Logan
15 that would allow you to create and play playlists of
16 audio files on PCs?

17 A. It says this program can compile a playlist. So,
18 looks to me like it can compile a playlist.

19 Q. Okay. And those playback controls you see there,
20 they're explained in more detail on page 1-20. It says,
21 "Playback Control Buttons." Do you see that?

22 A. Yeah.

23 Q. And there's a button there at the bottom that
24 says, "Plays the next wav file in the playlist." Do you
25 see that?

1 A. Yeah.

2 Q. Could you -- do you have an understanding of what
3 that would do?

4 A. Looks like -- I mean, it looks like it would -- if
5 you made a playlist, it will jump to the next file and
6 start playing it.

7 Q. If you look on the previous page, page 1-19,
8 there's a section called the "Playlist Button." Do you
9 see that? It's at the very top of the page.

10 A. Oh, okay. "1, 2, 3..."

11 Q. And it says, "The Playlist button" -- and it has a
12 picture of the button -- "allows you to compile the wav
13 files for playing."

14 A. Yeah.

15 Q. When you choose this button, the wav playlist
16 dialogue appears. Do you see that?

17 A. Yeah.

18 Q. And that's a typical-looking *Windows 95* kind of
19 dialogue box, right?

20 A. I can't be so sure it's *Windows 95*, but it's
21 definitely *Windows*-looking.

22 Q. Okay. So, would you agree that there were
23 software players in the marketplace before you got
24 involved with Mr. Logan on the player project that
25 allowed you to create playlists of audio files that you

1 brought into your PC from somewhere else and then skipped
2 forward to the next wav file?

3 A. It looks that way.

4 Q. Okay. So, you guys didn't invent that notion,
5 right?

6 A. I don't think we did.

7 Q. Okay. And similarly, the notion of skipping back
8 to a previous wav file in a playlist, you didn't invent
9 that, either, right?

10 A. As I said, this looks like it does those things;
11 so, probably not.

12 Q. Okay. So, if you look, I guess, about halfway
13 down the section there under "Collection Title" on
14 page 1-19, there's a little symbol that looks like a
15 disk; and to the right of it, it says, "Save the playlist
16 under a new name." Do you see that?

17 A. I do.

18 Q. Does that suggest to you that you could save the
19 playlists?

20 A. Yeah.

21 Q. And save it as a file in *Windows 95*?

22 A. It doesn't say you could save it as a file, but it
23 certainly looked like you can save it.

24 Q. Okay. And how else would you save it?

25 A. I don't know -- it could have its own internal

1 data structure that's not a file that's got all the lists
2 in it and maybe that's a file.

3 Q. Okay. But if you're going to save something in
4 *Windows 95*, you'd normally save it in a file, right?

5 A. Right.

6 Q. So, you could store information -- displayable
7 text about the audio file, right?

8 A. That's what it looks like.

9 Q. So, you didn't invent that notion, either, right?

10 A. I don't think we did, yeah.

11 Q. And if you look down at the very last icon in that
12 group, it's got the little triangle pointing to the right
13 with a bar. Do you see that?

14 A. The one that says, "plays the next file"?

15 Q. Right.

16 A. Yeah.

17 Q. What's your understanding of that?

18 A. My understanding is that you've constructed an
19 ordered list of files and this will go to the next one.

20 Q. So, does this suggest to you that you could select
21 a file in one of the scrollable lists and then press the
22 "play" button and it would play it?

23 A. That is what I would expect would happen with
24 this, yeah.

25 Q. Okay. So, you didn't invent that idea, either,

1 right?

2 A. I certainly didn't invent this dialogue.

3 Q. Okay. But you didn't invent the notion of --

4 A. I doubt it.

5 Q. -- selecting a file in a playlist in a scrollable
6 list and being able to play it, right?

7 A. I don't think I did.

8 Q. Okay. And neither you nor Mr. Logan nor Mr. Call
9 invented it in connection with the work you were doing in
10 1996, right?

11 A. I mean, I don't think we invented this; and that's
12 what you're saying it does.

13 Q. Okay. Then down below that, a couple of lines, it
14 says "repeat mode selector." Do you see that?

15 A. Yes.

16 Q. And it says, "Repeats the current file or all of
17 the playlist when the final file has played." Do you see
18 that?

19 A. Yeah.

20 Q. So, you didn't invent that idea either, right, of
21 having a playlist that plays around in an endless loop?

22 A. No, I don't think we did.

23 Q. And how did it come about that you got laid off?

24 A. Jim just told me he didn't need me, you know.

25 Q. You don't know why?

1 A. I think he -- I think he was impatient that we
2 couldn't get the software and the tapes done faster.

3 Q. Did you give a close look to compression methods
4 and processor loading?

5 A. Well, not that close. We felt that the processors
6 were getting faster all the time and that -- so, I don't
7 remember what -- so, I mean, this has 66-megahertz PC in
8 June. I mean, you could get faster ones. A month later
9 we're pulling out a 66 one. So, it's twice as fast. I
10 mean, this was kind of the golden age of Intel.

11 Q. So, with a little help from Intel, at some point
12 in the future you'd be able to --

13 A. Right.

14 Q. -- do whatever you'd need without worrying about
15 it, right?

16 Right?

17 A. I mean, we just knew that the technology curves
18 were on our side for this thing. So, I don't -- as I
19 said, I don't recall when we were trying out the sound
20 quality of these algorithms that -- these codecs, that
21 any of them seemed to tax these -- the house and the
22 computer, the laptops and stuff that we were using for
23 our purposes.

24 And we understood that in some cases the
25 chips, the CPUs that we might use inside this player

1 might -- for cost or power reasons or something, might be
2 slower than the correspond -- than chips that were in the
3 desktop. But it didn't seem to -- it seemed to us that
4 the storage numbers were much more limiting numbers we
5 needed to pay attention to than the CPU performance
6 numbers.

7 Q. What was your role in actually putting together
8 the disclosure that we see in the '178 patent?

9 A. Well, I first want to say my recollection of this
10 was that we did a bunch of patents. I didn't really
11 realize until you told me today that there were only two
12 patents involved in this case. I thought this whole blob
13 of patents that we worked on were together. So, I don't
14 have any particular recollection of how this patent was
15 put together relative to the other ones we were working
16 on at the time.

17 Q. Maybe a better way of putting it is what areas,
18 not what other areas, what areas were you seeking patents
19 on?

20 A. I mean, what I remember, I remember we would
21 have -- I had -- we had meetings where we talked about
22 what you'd now call the "metadata formats." We had -- we
23 were trying to patent the general scheme of the
24 distribution of it. We had -- we were trying to see if
25 we had anything to patent on what I'll call the "form,"

1 the structure of this metadata.

2 Those were the general areas. I mean, I
3 certainly -- I have no idea how we ended up with five
4 patents or three -- you know, the way the general
5 system -- I was working on the system to deliver stuff to
6 the customers; and whether that -- the fact that that
7 came out to be one patent or ten, I had no axe to grind.
8 I have no idea how we worked out how many patents there
9 were.

10 Q. So, I don't know if you recall --

11 A. I mean, I think they're related pieces of
12 technology. We'd have to dig a lot closer to see if
13 they're really exactly the same.

14 Q. That's what I'm trying to do.

15 A. I'd want to spend a lot more time on Sound Blaster
16 and this -- read this. This is a long time to do that.

17 Q. Okay. So, other than the downloading and the fact
18 that the Sound Blaster software is software, is there
19 anything else?

20 A. Well, I mean, that's enough already, you know.

21 Q. I guess I'm not --

22 A. I think you're trivializing the differences and
23 that we've got to go on and do sort of a deeper level to
24 say this.

25 Q. And, so, I just would like to have an exhaustive

1 list of those things that you see in it that you don't
2 see in the Sound Blaster program.

3 A. I see the communications and data communications
4 aspect, and I see more generic terms for sequencing file
5 and manual controls than what's specified in Sound
6 Blaster.

7 Q. You'd agree other than that one point, everything
8 else is there in the Sound Blaster program, right?

9 A. And whatever, you know, our -- the sequencing file
10 that we're talking about, I think, is more sophisticated
11 than in the Sound Blaster, based on the pictures of where
12 it's showing what the sequencing file is versus what
13 they're doing.

14 Q. Was there anything in the iPod that you noticed
15 that you thought you invented? And I'm talking about the
16 earlier one now.

17 A. Let's see. I'm not sure there was anything in the
18 use of the iPod itself that I thought I invented, but I
19 certainly did think that when podcasting became widely
20 known, that sort of -- that I was there kind of at the
21 start and that maybe some of the stuff we did was the
22 precursors to that.

23 Q. Okay. Apart from podcast --

24 A. I mean, it might have crossed my mind that if I
25 had been -- I -- if Logan had been as well-funded as

1 Apple at that time, then we could have gotten a lot
2 closer to the iPod than we did, that sort of ecology and
3 that sort of thing.

4 Q. Apart from podcasting, was there anything else
5 that you thought maybe you and Personal Audio had
6 contributed?

7 A. Well, I could see that there was a -- I mean, now
8 they have -- I see on the most recent stuff they have
9 this thing where it seems to want to create a playlist
10 based on what you like. Is that called "Genius"?

11 Q. There is a feature called "Genius."

12 A. Which I haven't explored fully; but it has crossed
13 my mind that that is similar to what we were talking
14 about, about adaptively changing the play material. And
15 I haven't really explored that much.

16 Q. Okay. These are both devices you observed and
17 used; and you didn't find yourself saying "Hey, Apple did
18 that and I invented it years ago"?

19 A. I wondered whether I invented anything because it
20 seemed like these -- my remembrance of these patents was
21 that a lot of the content of the patent was very detailed
22 about how you organized this metadata, which isn't really
23 visible to you as the user. So, the thought crossed my
24 mind; but it didn't cross my mind for very long because I
25 haven't -- I don't really have any stake in that or

1 any...

2 Q. Okay. And you don't know how metadata is
3 organized in the iPod or the iPod touch; is that right?

4 A. No idea.

5 Q. So, you really don't know whether it relates at
6 all to what you developed?

7 A. What I -- once they did the Genius thing, I began
8 to wonder a little --

9 Q. Okay.

10 A. -- because that sort of meant that they had a
11 richer metadata than was obvious at the beginning.

12 Q. Do you remember going to a National Association of
13 Broadcasters show earlier in 1996?

14 A. Yes, I remember. I think it was in Las Vegas. I
15 went there with Logan.

16 Q. Let me know if you can identify Exhibit 14.

17 A. I can read it. I can see what it says it is.

18 Q. What is it?

19 A. Well, it's a note from Bill Bordy about --

20 Q. It's about battery --

21 A. Yeah. It's about batteries. That's something we
22 really worried about.

23 Q. I'm sorry?

24 A. This is something we really worried about for the
25 thing in the car.

1 Q. And what was the nature of the worry?

2 A. That the PC device we were going to put in the car
3 was going to discharge the car. If you plugged it into
4 the car charger's power, that the person would arrive
5 with a PC full of music and a dead battery to start his
6 car. This would make a bad impression on his commute.

7 Q. 1 and 2 are the patents. That's right.

8 I just wanted you to have those in front of
9 you for a few questions. I believe you said you left
10 Personal Audio in 1997; is that right?

11 A. I think it was like the very end -- I think I got
12 laid off at the very end of 1996.

13 Q. Okay. Okay. And after that did you have any
14 substantive involvement in prosecuting these patents and
15 getting them from the Patent Office?

16 A. No, sir.

17 Q. Were you involved at all in responding to Office
18 Actions or examining prior art or anything like that
19 after you left?

20 A. I would get -- I got a couple letters from Charlie
21 Call over the years asking me to sign some forms, which I
22 did; but it was really just signing things, not --
23 certainly not looking -- I know what "prior art" means.
24 Certainly nothing analytical like that.

25 I signed some documents at their request, but

1 I did not do any real work on the patent or analyze
2 anything.

3 Q. You didn't work on drafting the claims or anything
4 like that?

5 A. No.

6 Q. Specifically with regard to Exhibit 1, which we
7 call the "'076 patent," earlier Mr. Stephens asked you
8 some questions about the claims of that patent. Do you
9 recall that?

10 A. Yes.

11 Q. Do you know what a means-plus-function claim is?

12 A. No.

13 Q. Do you know how to construe a means-plus-function
14 claim?

15 A. I don't know what "construe" means in patent talk.

16 Q. Fair enough. Figure out what a
17 means-plus-function claim means.

18 A. I don't think so.

19 Q. Okay. Have you ever been involved in what we call
20 "claim construction" and figuring out what the definition
21 of the words of patent claims mean?

22 A. No.

23 Q. Okay. Then for Exhibit 3, this Sound Blaster, do
24 you recall being asked about that?

25 A. Yeah.

1 Q. Prior to today when Mr. Stephens showed you that
2 document, had you ever seen it before?

3 A. Don't think so.

4 Q. Had you ever seen the product -- specific product
5 that's described in that document before?

6 A. I don't think so.

7 Q. Had you ever -- and I assume I know the answer to
8 this question, but had you ever analyzed that Exhibit 3,
9 the Sound Blaster, in connection with Exhibits 1 and 2,
10 the patents-in-suit?

11 A. No.

12 Q. Have you ever served as an expert in a patent
13 case?

14 A. No.

15 Q. So, have you ever done any analysis of that type,
16 expert-type analysis of whether patent claims cover prior
17 art?

18 A. No, although I'd say that we first worked on the
19 Pause patent in the beginning of that notebook. You will
20 see my feeble efforts at figuring out about patents at
21 the University of Maine library.

22 Q. I see. And have you ever performed what we call
23 an "infringement analysis" comparing patent claims to
24 another product to see if it infringes?

25 A. No.

1900

1 Q. Had you ever done anything like that in connection
2 with the iPod or iPhone?

3 A. No.

4 Q. Are you aware of any of the disputes in this
5 lawsuit concerning claim construction or the meaning of
6 any of the terms of the claims?

7 A. I don't know anything about this lawsuit except
8 what I saw in the subpoena or the -- the disputes about
9 the -- no, I guess I'm not.

10 (Video presentation concluded.)

11 THE COURT: Is that it?

12 Next witness?

13 MR. STEPHENS: Your Honor, Apple calls Eugene
14 Novacek.

15 THE COURT: All right.

16 MR. STEPHENS: Your Honor, may we take a
17 moment to set up?

18 THE COURT: Well, he's not here yet. I'd
19 start setting up.

20 MR. STEPHENS: Okay. Thank you.

21 (The oath is administered.)

22 THE COURT: And, Mr. Schutz, if somebody on
23 your side needs to see the screen, you can probably put
24 that chair on the ramp maybe and see it or -- you don't
25 want to be right in front of the jury.

1 MR. HOLDREITH: Yes, sir.

2 THE COURT: But off to one side or the other.

3 You can bring your chair down here maybe and
4 sit next to Chris.

5 MR. HOLDREITH: Thank you.

6 MR. STEPHENS: Your Honor, we're also going to
7 project on the screen up there.

8 THE COURT: Okay.

9 MR. CORDELL: Your Honor, may I make a brief
10 transition statement?

11 THE COURT: You may.

12 MR. CORDELL: Thank you.

13 Good afternoon, ladies and gentlemen. First,
14 let me tidy up a couple of things. We are now through
15 hearing from all of Apple's employees in this case. So,
16 you've heard from Mr. Ng and Mr. Boettcher and Mr. Heller
17 and former employee Mr. Fadell. In opening I talked
18 about a couple other guys, and I don't want you to think
19 that we missed somebody or somehow skipped them. I
20 talked about Mr. Wysocki and Mr. Robbin. Mr. Wysocki and
21 Mr. Robbin are both software guys who work -- you heard
22 Mr. Heller tell you what they do. They work on the
23 *iTunes* side of the business. And if there's one factor
24 we're all convinced of now, it's that *iTunes* is not
25 relevant to this case; so, we're not going to call them

1 and make you listen to more source code. I know it was
2 exciting this morning, but we'll spare you that. We
3 think we've covered those issues.

4 And with that, we're now going to move into
5 another phase of the case starting with Mr. Eugene
6 Novacek. Mr. Novacek is going to demonstrate for you a
7 system that he invented a long time ago and he's going to
8 show you all it can do and all of its features and all of
9 its functions.

10 After Mr. Novacek, our expert, Dr. Steve
11 Wicker, is going to take the stand; and he's going to tie
12 all of this together. He's going to tell you why the
13 Apple products don't infringe based on all of the
14 testimony of the fact witnesses, the employees that you
15 heard from. And then he's going to talk about invalidity
16 with respect to Mr. Novacek's systems and a couple of
17 other pieces of prior art. Thank you.

18 DIRECT EXAMINATION OF EUGENE NOVACEK

19 CALLED ON BEHALF OF THE DEFENDANT

20 BY MR. STEPHENS:

21 Q. Good afternoon, Mr. Novacek.

22 A. Good afternoon, everyone.

23 Q. Could you tell the jury what the system here in
24 the room in front of them is?

25 A. Yes. There are two PCs basically -- the left one

1 is called an "on-air PC," and the right one is called a
2 "file server" -- that comprise a system we call "DAD"
3 from approximately 1995 era.

4 Q. Is this something you were involved in creating?

5 A. Very much so, yes.

6 Q. And how were you involved in it?

7 A. I am the co-inventor of DAD from 1991 until today.

8 Q. Does your company sell these systems?

9 A. Yes, we do.

10 Q. Did it sell this type of system in 1995?

11 A. Yes, we did.

12 Q. What's the name of your company?

13 A. ENCO Systems.

14 Q. And what does "ENCO" stand for?

15 A. The E and N is Eugene Novacek's Company.

16 Q. Were you a founder, Mr. Novacek, of Eugene
17 Novacek's Company?

18 A. Yes, I was.

19 Q. Was this system actually made by ENCO?

20 A. Yes, it was.

21 Q. And when was it made?

22 A. The left workstation, the on-air machine, was made
23 in November of 1994 and sold to a client in December of
24 '94. The right machine was manufactured in March of '95.

25 Q. How do you know that?

1 A. There are serial numbers imprinted on the back of
2 each of the major boxes, little black boxes on the bottom
3 of those stands. Those serial numbers we track to keep
4 track of everything we've done, who we sold it to, when
5 it was built, what components comprised it, things like
6 that.

7 Q. Is there anything in the system here in the
8 courtroom in front of the jury that ENCO did not offer
9 for sale to the public prior to October, 1995?

10 A. No.

11 Q. Can DAD play digital audio?

12 A. Yes, it can.

13 Q. And how was digital audio stored in DAD?

14 A. Each individual audio component, a song, for
15 example, is an audio file that is stored on a hard disk.

16 Q. Can DAD play playlists?

17 A. Yes, it can.

18 Q. And how are playlists stored in DAD?

19 A. Playlists -- being a sequence of events like play
20 a bunch of songs, play a bunch of commercials, things one
21 after another -- are themselves a file that also live on
22 a hard drive.

23 Q. And are those playlist files stored separately
24 from the audio files?

25 A. Yes, completely separately.

1 Q. Can DAD download audio files over a network?

2 A. Yes, it can.

3 Q. Can DAD download playlist files over a network?

4 A. Yes, it can.

5 Q. What kind of organizations have used DAD since you
6 first started selling it?

7 A. There are over 10,000 of them out there now but
8 things that you'd be familiar with would be places like
9 CNN, ESPN, The Weather Channel, Oprah Winfree Show uses a
10 DAD since the mid Nineties.

11 Q. Any others?

12 A. Oh, many. I could go on forever. There are
13 stadiums and arenas all over that have used it. It's
14 been used in many Olympics for playing back anthems, you
15 know --

16 Q. Any Texas stadiums, Mr. Novacek?

17 A. Yes. The Dallas Mavericks soccer team were an
18 early adapter of DAD, the Texas Rangers.

19 Q. Has it ever been used by the military?

20 A. Yes, it has.

21 Q. Do you have the source code for the software that
22 is on the machines today?

23 A. No, not exactly the source code for this version,
24 no.

25 Q. Is that because of the time that's elapsed?

1 A. Correct.

2 Q. Are you prepared to demonstrate this system to the
3 jury?

4 A. Yes, I am.

5 MR. STEPHENS: Your Honor, may the witness
6 step down to demonstrate --

7 THE COURT: You may. Just be sure to keep
8 your voice up so everyone in the courtroom can hear you.

9 THE WITNESS: Understood.

10 BY MR. STEPHENS:

11 Q. Mr. Novacek, there is a chair there. I know your
12 foot is hurt. If you need to sit --

13 MR. STEPHENS: Your Honor, if it's okay --

14 THE WITNESS: Is that all right?

15 THE COURT: All right.

16 A. Can I turn it on?

17 BY MR. STEPHENS:

18 Q. Yes, please.

19 Mr. Novacek, could you start by telling the
20 jury what we have here? What's the system on your left
21 and the jury's right?

22 A. Okay. As I mentioned -- can you hear me okay?

23 As I mentioned before, this is what we call an
24 "on-air workstation."

25 THE COURT: Excuse me. You moved the angle of

1 that one computer. Can the jury see both of them?

2 (Jurors respond affirmatively.)

3 THE COURT: All right. As long as you can
4 see, because it looked to me like you moved that right
5 one off.

6 THE WITNESS: I'm going to be sitting --

7 You'll see everything on this display up on
8 the monitor. It is booting right now, and everything I
9 do you'll see. So, it's not too critical you see this
10 one; and, again, I didn't want my back to you so I angled
11 it slightly.

12 Can I continue?

13 BY MR. STEPHENS:

14 Q. Yes, please.

15 A. So, this again is the on-air workstation, "on-air"
16 meaning it's going to go on air. Just like it sounds if
17 you've seen television programs for broadcasters, we're
18 on the air. This is the on-air machine. What plays from
19 this machine generally is broadcast on a television
20 station or a radio station or whatever might be. It
21 plays audio.

22 This one here, the server, is a file server.
23 It serves files to this workstation and usually many
24 other workstations. We try to keep it smaller so that,
25 you know, we didn't have to have too many things here.

1 This is all we need to demonstrate what we're talking
2 about.

3 Q. Mr. Novacek, can you show the jury how the DAD
4 system can play a playlist of audio files?

5 A. Yes, I can. So, now I'll move over here.

6 Right now I'm just going to clear the screen
7 so you don't have to see too much stuff. The "f:\dad"
8 indication means that I'm connected to the server. F
9 drive is the hard drive that's on that server over there.
10 I'm connected between these two with a little cable that
11 let's them communicate.

12 And if I simply run the DAD program, I'm
13 running on the network. I'm running on the server. So,
14 I'm in what we call "network mode." So, I'll wait until
15 it starts up and then demonstrate what Mr. Stephens has
16 asked.

17 There is a slight piece of video missing. I
18 don't know if you can resend your feed somehow.

19 It's not critical. I'll proceed without it.
20 There is a --

21 THE COURT: Let me ask one question just to be
22 sure. You mentioned you were on the network. Is this
23 hooked up to the court's network somehow through that
24 system?

25 THE WITNESS: No, not at all.

1 THE COURT: So, the network you're talking
2 about is those two computers?

3 THE WITNESS: That's correct.

4 THE COURT: So, you're not hooked into our
5 system?

6 THE WITNESS: Absolutely not.

7 THE COURT: Okay. All right.

8 THE WITNESS: It's an isolated network between
9 themselves.

10 THE COURT: All right.

11 THE WITNESS: Generally there would be many
12 more playing the game, but we're only showing two in this
13 demonstration. We're not on the Internet or connected to
14 anything of yours.

15 THE COURT: All right.

16 BY MR. STEPHENS:

17 Q. Mr. Novacek, I'm sorry. Before you demonstrate
18 playing back a playlist, are there any audio files on
19 that on-air machine now?

20 A. No, there are not.

21 Q. Can you show the jury that?

22 A. Yes, I will. I'll get out of the program to show
23 you that.

24 And once again the "F" indicates that I'm on
25 the network. I'm going to change over to C, which

1 indicates I'm on this drive. There is a C drive which is
2 here and an F drive which is there (indicating). I'm now
3 looking at this C drive.

4 We store audio cuts in a directory called
5 "cuts" on the C drive; and if I simply use this directory
6 command, D-I-R, it shows me there is nothing there.
7 There are zero bytes. That means zero amount of storage
8 is being used in a directory called "cuts," which is
9 where we store audio files. So, there are no audio
10 files.

11 Q. Are there any playlist files on the on-air
12 machine?

13 A. No, there are not.

14 Q. Could you show the jury that?

15 A. Yes. In this area of this local hard drive, this
16 is where playlists are stored on a local hard drive; and
17 it is also empty. Zero bytes. No cuts, no playlists.

18 Q. Thank you, Mr. Novacek. Now if you could show the
19 jury how to play a playlist of audio files.

20 A. Okay. Once again, I'm starting up DAD in network
21 mode because there's nothing on this drive. I can't play
22 anything from this drive right now. So, I'm connected to
23 the server and -- in fact, while this is starting up, the
24 jury may be able to see this one screen; and I'll
25 describe --

1 THE WITNESS: Sorry, your Honor, you can't see
2 it too well; and we're not projecting it.

3 THE COURT: That's all right.

4 A. But the activity of this on-air workstation --
5 this says "on-air," which is this machine. I can see
6 activity that server sees relative to this machine. So,
7 these files are files that this machine currently has
8 open on that hard drive. And that will be important
9 later. So, I'll just leave that there. It's not for
10 anything else.

11 BY MR. STEPHENS:

12 Q. Mr. Novacek, could you explain what we see on the
13 screen to the jury?

14 A. Yes. This is one of the many interfaces of DAD.
15 On the left you'll see -- I'll just circle it with the
16 mouse for now -- I can use the laser pointer.

17 This left side here we call a "playback
18 machine." This is called "Playback 1." On the right we
19 have a record machine. That's just like it sounds. It's
20 for recording audio, getting audio into the machine; but
21 the playback is primarily used for playing back an
22 existing playlist. You can see I have a button here
23 called "playlist," which has a playlist called
24 "musicbed." There is a playlist here called "musicbed"
25 with some audio files ready to play.

1 Q. What are the items in the scrollable list?

2 A. These items here, like 60 Minutes Ticking, it's
3 actually music from the 60 Minutes television program.
4 These are songs, small little pieces of music, songs used
5 in a television broadcast.

6 Q. How are those songs stored, Mr. Novacek?

7 A. Each one of these files -- songs is an individual
8 file on the hard drive of that server.

9 Q. Okay. Why does the playback machine look the way
10 it does?

11 A. When we invented DAD in 1991, we wanted to present
12 it to a public that really wasn't used to graphics of
13 this nature or anything digital like this. We were
14 trying to replace CDs and tape machines. So, we wanted
15 to emulate things that people were already familiar with.

16 Now, it's hard to emulate a stack of CDs; so,
17 that part of this machine is new. But the "play,"
18 "pause," "stop" buttons are familiar to the users. So,
19 we tried to emulate things like the CD player or tape
20 deck, things that everybody was familiar with in the day.

21 Q. Okay. Could you go ahead and play the playlist?

22 A. Yes. Before I do that, the top slot of this
23 machine is -- this is the "play" slot. It's whatever --
24 whatever is playing is this top slot. You'll see some
25 things happening when I actually push this "play" button.

1 So, you're hearing the 48 Hours Music Team.
2 It's counting down, one minute and eight seconds. When
3 it gets down to zero, it's going to be done. When this
4 pacer bar finishes, it will -- it's a graphic
5 representation of how much time is left to play. I'll
6 turn it down a little bit so you can hear me talk.

7 On the right side there is a digital
8 representation of the volume level of what you're
9 hearing. It's called a "VU meter," a "volume unit
10 meter."

11 Q. Mr. Novacek what will happen if you just leave
12 this playing?

13 A. This is right now set to completely automatically
14 play. The little "A" there says to automatically play
15 the next one. So, at the end of 48 Hours music, when
16 this pacer bar finishes, it's going to play 60 Minutes
17 Ticking.

18 Q. Now, where is the playlist file that the machine
19 is playing coming from?

20 A. It is also on the server.

21 Q. And the audio files are also coming from the
22 server?

23 A. They're all on the server.

24 Q. Okay. Is there a way to use the on-air system
25 without using the file server?

1 A. Yes, there is.

2 Q. Where would it get the audio files and the
3 playlist files from?

4 A. It would have to be downloaded from the server
5 into the local workstation's hard drive, so from that
6 server into this machine.

7 Q. Is there a way using DAD to transfer those files
8 to the on-air machine?

9 A. Yes, there are.

10 Q. And how would you do that?

11 A. There are several ways, but one easy way to show
12 right here with what we have is called "playback look
13 ahead." Remember this machine is called "playback" and
14 think of the word "look ahead." It looks ahead in the
15 list of these events to try to predict what is going to
16 be needed to play that playlist and downloads everything
17 required from the server into the local hard drive.

18 Q. And how would you get the playlist to the on-air
19 machine?

20 A. You would go through another procedure to download
21 the playlist from the server to the local machine.

22 Q. Okay. Could you go ahead and demonstrate the use
23 of playback look ahead to download a playlist of files to
24 the on-air machine?

25 A. Yes. I'm going to close this record machine and

1 bring up another player. So, you can see PBK 1, 2, 3,
2 and 4. It's just like this Playback 1. There are just
3 four of them so you can do many things at once. And
4 Playback 2, which is now empty, has been preconfigured to
5 do the playback look ahead function that I'm describing.

6 I'm going to pick a playlist to download.
7 There is one here called "Gene 44." I'll load it into
8 the playback machine. The reason I kind of wanted to
9 reference this machine here, you may start seeing that
10 first line on that machine ticking away. It's copying
11 individual elements from this playlist and downloading
12 them from the server into the local hard drive.

13 I know you can't see that but I can see it and
14 I know as it's blinking there, it's every single audio
15 file on this playlist copying -- downloading from the
16 server into the local hard drive.

17 Q. Mr. Novacek, when you say "local hard drive," what
18 do you mean by that?

19 A. The C drive of this on-air workstation. In fact,
20 the jury can probably see this red light blinking like
21 crazy right now because it's reading -- it's getting a
22 whole bunch of stuff downloaded into it and now the red
23 light has stopped blinking and I don't see any activity
24 on the server. The download is now complete for all the
25 audio files in this playlist to access their music.

1 Q. Okay. Mr. Novacek, can you now use the DAD system
2 to download a playlist to the on-air machine?

3 A. Do we want to see the cuts first, the songs on the
4 local hard drive while -- it's probably easier to do
5 that.

6 Q. Okay. Whatever you prefer.

7 A. I'm going to exit out of the network mode, and
8 you'll see all of the files close out of the network
9 server.

10 So, there's absolutely nothing going on.
11 There is no connection between the on-air workstation and
12 the server anymore.

13 And I'm going to go to the C drive again. And
14 remember when I was looking at the cuts directory, it was
15 empty. Now it's got the audio files that were in that
16 Gene 44 playlist. These were not there before I just
17 simply did the playback look ahead function and they
18 downloaded these files and they're on this local hard
19 drive.

20 Q. Okay. Now, Mr. Novacek, can you use the DAD
21 machine to download a playlist?

22 A. Yes. So, I'm going to run DAD on the local
23 machine; and you notice there is no activity on the
24 server anymore. It's doing everything that it did before
25 but not talking to the server. It's doing everything

1 locally.

2 Q. Mr. Novacek, can I ask you, just to be clear for
3 the record, when you're talking, to refer either to the
4 "on-air machine" or to the "server" rather than this
5 "local drive" or --

6 A. Okay. I understand.

7 Q. Thank you.

8 A. So, I'll just repeat what I said in those terms.
9 There's no activity on the server screen because of the
10 on-air workstation. There are no files open. Nothing is
11 happening on the server because of this on-air
12 workstation.

13 So, now I'm running DAD; and you can see I
14 have Playback 1 and 2 displayed.

15 If I go ask for a playlist, there are none.
16 Just like I showed you there were no playlists on this
17 local hard drive and this is reflecting that. DAD is not
18 finding any playlists on this local hard drive.

19 Q. Again, Mr. Novacek, could you refer specifically
20 either to the "on-air machine hard drive" --

21 A. Oh. Yeah, okay, "this." I understand. There are
22 no playlists on this on-air workstation's hard drive, and
23 this is reflecting that.

24 So, I'm going to go ask to get a new one, to
25 find a new playlist that I can work with. And I'm going

1 to use what we call an "import" function, which is a
2 download. And I'm going to point to the server now. I'm
3 going to say go look at the F drive -- remember F is
4 indicating that it's on the server -- in the place that
5 we look for playlists. And there are all the playlists
6 that were on the server.

7 The Gene 44 is the one I was using as an
8 example. So, we touch "Gene 44." It's a DAD 486
9 playlist; so, it doesn't have to do anything to it. It
10 just will download it from the server hard drive to the
11 on-air workstation's hard drive; and now we see one
12 playlist, the Gene 44 playlist, with 13 events in it.

13 So, now I can load that playlist into a
14 playback machine; and it's ready to play.

15 Q. Okay. Now, where do the audio files in that
16 playlist file reside?

17 A. In the on-air workstation's local hard drive.
18 Remember I did a directory and cut. We have those cuts
19 there. They're right here on this on-air workstation's
20 local hard drive.

21 Q. Okay. Can you play it now?

22 A. Yes, I can. (Demonstrating.)

23 This is a rather quiet song. It's the
24 Diagnosis Murder music.

25 So, it's playing now from the hard drive.

1 Remember, no activity on the server at all. It's all
2 coming from the hard drive. And the jurors might see the
3 red light blinking occasionally to indicate it's reading
4 bits and pieces of this audio file from the local hard
5 drive of the on-air workstation.

6 Q. Now, Mr. Novacek, what will happen if you
7 disconnect the network connection between the on-air
8 machine and the server?

9 A. Absolutely nothing.

10 Q. Could you demonstrate that, please?

11 A. Sure. (Demonstrating.)

12 Okay. So, I just removed the only link
13 between these two workstations. This is the connection
14 between the server and the on-air workstation, the only
15 way they can talk to each other. So, it's just
16 completely disconnected; and it's still playing and will
17 continue to play forever. It has no need for the network
18 at all.

19 Q. Okay. Now, when you say it will continue to play
20 forever, what do you mean?

21 A. This playlist, like the one we looked at earlier,
22 is configured to automatically play from one song to the
23 next. It will just keep going. And when it gets down to
24 the bottom of the playlist, it will just go right back up
25 to the top and start right over again.

1 Q. Mr. Novacek, is there a way to skip forward to the
2 next song in the playlist?

3 A. Yes, there is.

4 Q. How do you do that?

5 A. So, in looking at this list, the next element that
6 will play is the Letterman music. If I want to just go
7 to the Nanny music, I just touch it; and it is now next.

8 If I let it finish, here you'll see that it
9 jumps right to Nanny.

10 Q. Okay.

11 A. We'll let it finish, and it will do that.

12 Q. Okay.

13 A. There it is now playing the Nanny music.

14 Q. Now, what if you want to jump until the next song
15 without waiting for the current one to finish?

16 A. That's fine. I can just touch The Walker, Texas
17 Ranger music and hit the "next" button; and it will fade
18 out the Nanny music and go right into the Walker, Texas
19 Ranger music.

20 Q. Now, what happens if you hit the "next" button
21 without selecting a different song?

22 A. It will just go to the next element in the
23 playlist.

24 Q. Okay. Could you demonstrate that?

25 A. Yeah. I'll just do it right now. And it just

1 goes to As the World Turns. And As the World Turns was
2 the last element in this playlist; so, it goes right back
3 up to the top to start the Diagnosis Murder as the next
4 element.

5 Q. Okay. Could you use the scrollable list there to
6 select a song in the middle of the playlist and then skip
7 directly to that?

8 A. Okay. I'll scroll down and choose Second Chances
9 music and hit "next." I can choose anything I want from
10 anywhere within the playlist, above or below where I'm
11 currently playing, with no problems at all.

12 Q. So, is there a way to skip back to a previous song
13 in the playlist?

14 A. Yes. If we look at the playlist, Second Chances
15 is right here. The previous song is Pickett Fences. So,
16 I just touch Pickett Fences and hit "next"; and it's
17 playing the previous song.

18 Q. Mr. Novacek, is an on-air machine a personal
19 computer?

20 A. Yes, it is.

21 Q. Does it have a sound card?

22 A. Yes, it does.

23 Q. Does the sound card have a digital-to-analog
24 converter?

25 A. Yes, it does.

1 Q. Is there a number on the screen that indicates the
2 next item in the playlist?

3 A. Yes. This "pos" is short for "position." So, in
4 other words, Position 10 is Second Chances.

5 Q. Is there a variable in the DAD software that
6 stores a number indicating the currently playing item in
7 the playlist?

8 A. Yes, there is.

9 Q. What's that?

10 A. It's called the "position." The variable in the
11 code is actually called "position."

12 Q. Can a DAD playlist have more than one type of item
13 in it?

14 A. Yes, it can.

15 Q. Can you explain that?

16 A. Yes.

17 Just so I can -- so it won't move around on me
18 while I'm demonstrating this.

19 The normal printed elements of this playlist,
20 the music ones, the ones that say "music," are pieces of
21 audio. So, the type that these are are things that you
22 could play. So, they're a play type.

23 Right below it you'll see this white bar that
24 says "read the local weather." It's not a piece of audio
25 at all. It's a comment. It's a message to the user to

1 do something or something of interest. It can be
2 anything anybody programs into the playlist. So it's a
3 comment type; so, it's different from the play type.

4 A little further down you'll see another one
5 that's weird looking. It's called "hard branch at
6 19:00." This is a timing event that says I need to do
7 something at 7:00 at night. So, it's a T-type, a timing
8 type.

9 So, there are three different types right in
10 this one little playlist.

11 Q. And where is the type information stored?

12 A. It's actually stored as a data field in the
13 playlist file itself.

14 Q. And does that field have a name?

15 A. Yes. It's actually called the "type field."

16 Q. Is there a way to search for songs based on user
17 preferences like, let's say, an artist name or a subject
18 matter?

19 A. Yes, there is.

20 Q. Can you demonstrate that, please?

21 A. Yes. I'll go to this machine and say I want to
22 generate a new playlist. And what we have on the left is
23 all of the material that's in my library, everything
24 that's in the system, by name and by cut number.

25 I make -- you know, one of the criteria, I

1 want a love song. So, I can say search for something
2 with the word "love" in it; and it's finding in this
3 library these four songs that are something to do with
4 love. "Love and War," "I Need Love," "Still in Love With
5 You," "When It's Love."

6 And the one I really wanted was "Still in Love
7 With You," and I can put it in a playlist by saying add
8 the current cut.

9 I can also do some things like show me just
10 the sound effects that are in this system. So, instead
11 of searching for it, I can use this "group" button, say
12 show me sound effects and there is a glass-breaking sound
13 effect and I can add that to the playlist. So, now I
14 have a "love" cut following by a glass-breaking sound
15 effect. So, I was using the search and organization
16 capability of this system to build up a playlist; and I
17 could continue on forever doing that.

18 Q. Well --

19 A. I won't, though. I promise.

20 Q. I know you'd like to and I'd be very interested,
21 but I think we have enough right there. I have a couple
22 additional questions before I ask you to re-take the
23 stand. First, does DAD ever scan a playlist looking for
24 a particular type of track?

25 A. Yes.

1 Q. Okay. And can DAD play songs on a schedule?

2 A. Yes, it can.

3 Q. Now, Mr. Novacek, if you would reconnect the
4 network.

5 MR. STEPHENS: And, your Honor, if he may
6 re-take the stand.

7 THE WITNESS: Can I go back?

8 THE COURT: Please.

9 BY MR. STEPHENS:

10 Q. Thank you for the demonstration, sir. I'd like to
11 back up now and ask some background questions. Where did
12 you grow up?

13 A. In Southfield, Michigan.

14 Q. And where did you go to school?

15 A. I graduated high school in South Field, Michigan;
16 and then I did my university studies in the Massachusetts
17 Institute of Technology and Harvard University in
18 Cambridge, Massachusetts.

19 Q. And what degrees did you get?

20 A. I received my bachelor's of science and
21 engineering from MIT.

22 Q. Any further schooling after that?

23 A. I completed my graduate coursework at MIT, but I
24 didn't get the master's degree itself.

25 Q. Okay. Why not? Was there something you didn't

1 complete?

2 A. Yes. I had an incredible job opportunity. I was
3 planning on getting married to my wife, who is also an
4 MIT engineer, and it was just too costly to stay for
5 another term to complete it and I went out into the real
6 world.

7 Q. Was there some requirement you didn't complete?

8 A. Yes, the thesis, the master's thesis. I had
9 written a bachelor's thesis; and, you know, I didn't need
10 to do another one. I was fine with it. My employers
11 were fine with it.

12 Q. Do you have any children?

13 A. Yes, I do, two.

14 Q. And where do they live?

15 A. My son lives in Boston, and my daughter lives in
16 Houston.

17 Q. What does your daughter do in Houston?

18 A. She's an anchor reporter for FOX Television News.

19 Q. Mr. Novacek, how did you come to create DAD?

20 A. Oh, wow. In the Eighties ENCO, my software
21 company, was an industrial process control company, which
22 means we did custom hardware and software applications
23 for industry, manufacturing plants, assembly plants,
24 things of that nature.

25 When the Nineties rolled in, particularly when

1 the Gulf War of 1991 happened, that industry changed and
2 I found myself needing to move out of industry and into
3 something else.

4 I linked up with a childhood friend of mine,
5 Dave Turner. We met when we were 12-year-olds in junior
6 high, did everything that junior high and high school
7 kids do together. We were best friends. He knew that I
8 was looking to do something. He was in broadcasting, and
9 thought that we might apply the software I did for
10 industry in the broadcasting industry. So, it actually
11 started not too far from here. In October of '91, we
12 attend an SBE, Society of Broadcast Engineering,
13 conference in Houston and we were evaluating the status
14 of software in broadcasting in the day and we would look
15 at vendors' exhibits, go have coffee, and on the back of
16 a napkin write down what we saw and what we thought we
17 could do.

18 And at the end of the show, literally on the
19 back of a napkin, DAD was born. We decided to do digital
20 audio for broadcasters.

21 Q. Mr. Novacek, where is ENCO located?

22 A. ENCO's headquarters are still in Southfield,
23 Michigan.

24 Q. And how many employees does ENCO have?

25 A. Approximately 25.

1 Q. And I think you mentioned this already, but how
2 many DAD systems have you sold?

3 A. There are over 10,000 DADs worldwide.

4 Q. How much does a system like the one in the
5 courtroom here cost?

6 A. Well, it varied greatly as the price of technology
7 changed; but in the day those machines were worth about
8 \$20,000 apiece, the left one being a little cheaper than
9 the right one. The server was a little bit more
10 expensive. So, that's 20,000 on the left and about
11 30,000 on the right.

12 Q. Who owns this system?

13 A. Apple Computer.

14 Q. Did Apple buy it from you?

15 A. Yes, they -- yes, they did, indirectly.

16 Q. When you say "indirectly," did one of their
17 attorneys buy it from you?

18 A. Yes.

19 Q. And how much did Apple pay for it?

20 A. For this -- and there's another component that
21 we're not showing. There is a third piece to this, an
22 on-air production server; and the server was 75,000 plus
23 some barter.

24 Q. And what was the barter?

25 A. We tried for some Apple products, PCs, laptops, a

1 couple iPhones, things of that nature.

2 Q. And was that consistent with what you thought
3 these machines were worth?

4 A. Actually slightly less, yes. We -- you know,
5 Apple wanted, you know, to negotiate a little bit. We
6 thought they were worth a little more; but, yeah, that
7 was pretty commensurate with what they were worth and
8 what we were willing to let them go for.

9 Q. Did Apple buy them for this case?

10 A. No.

11 Q. How did you manage to assemble a system from the
12 early 1990s?

13 A. The left machine, the on-air workstation, the
14 on-air PC, like I said, was built in November, '94 and
15 sold in December of '94. It was sold to WMC, a radio
16 station in Memphis, Tennessee. The engineer there, Paul
17 Barzizza, was a longtime fan of ours. He was the chief
18 engineer of the radio station, was a big fan, and bought
19 our systems. And as time evolved, we sold new systems.
20 He sent it back to us in trade. He wanted to upgrade
21 that system as to something else. It was still in
22 perfect condition; so, we took it back in trade for a
23 newer system.

24 Q. When did Apple buy it from you?

25 A. I believe it was in 2007, late 2007.

1930

1 Q. Have you been paid by Apple for consulting in this
2 case?

3 A. Yes, I have -- indirectly, yes.

4 Q. Through its lawyers?

5 A. Yes.

6 Q. And what's the rate that you charged Apple?

7 A. I charged 500 an hour.

8 Q. Is that rate the same as you charge your other
9 customers?

10 A. Yes, it is.

11 Q. And how much have you charged Apple for this case?

12 A. 103,000 so far.

13 Q. Now, did ENCO exhibit DAD at trade shows?

14 A. Yes, as many as we could.

15 Q. Which trade shows?

16 A. The primary one was called "NAB," National
17 Association of Broadcasters. They have an
18 internationally-attended show in Vegas in the spring
19 every year. Our first NAB was April of '92; and we've
20 been at every one since and many, many other shows, SBE
21 shows, shows worldwide. I just got back from Singapore a
22 couple of days ago from a show there. So, it's -- you
23 know, you can't sell it if you don't show it.

24 Q. Was ENCO at the NAB show in 1996?

25 A. Yes, we were.

1 Q. Was ENCO demonstrating DAD at the NAB show in
2 1996?

3 A. Yes, we were.

4 Q. Did ENCO provide manuals for the DAD system?

5 A. Yes, we did.

6 Q. How did that work?

7 A. I -- Dave Turner and I, the two co-inventors of
8 it, started writing the original manuals in '91-'92 as we
9 created it; and we eventually hired a tech writer to do
10 that work for us. So, we would feed Michelle Monroe, our
11 tech writer, with what we wanted in the manual, me as
12 development and Dave as a part of development, so that we
13 could convey information about how to use DAD to our
14 users in less geeky speak. I mean, we are engineers.
15 I'm a nerd from MIT, and I wouldn't write the best
16 readable manual. So, Michelle did a really good job of
17 making it readable.

18 Her job was to create the manual and talk with
19 sales to find out how many manuals were needed for the
20 next couple weeks for shipment. So, we didn't want to
21 print a thousand manuals and have them sitting around
22 because they were outdated within days. We were changing
23 DAD nearly every day. So, she would print just enough --

24 Q. I'm sorry to interrupt. Can I ask you to just
25 slow down just a little bit?

1 A. Sorry.

2 Q. I see the court reporter there showing signs of
3 stress, although she's very good.

4 A. Understood.

5 Q. Continue, sir.

6 A. So, she would try to print just as many manuals as
7 she needed just to satisfy current orders because, again,
8 it was changing so quickly.

9 A more important part of how we distributed
10 them was electronically. So, she would print manuals,
11 and we would publish them. Every single DAD got a DAD
12 manual, and she put her updates of the manual on our
13 electronic bulletin board. It's a form of the Web back
14 in the Nineties. The Web didn't exist like it does today
15 then so --

16 Q. Let me stop you right there, sir. How were those
17 printed manuals bound together?

18 A. We purposely, when we printed them, printed them
19 on double-sided paper to save paper and three-hole
20 punched them so that you could -- and they were shipped
21 in a three-ring binder so it would be very easy to
22 replace the pages as we constantly updated them. So, we
23 would ship one full manual with an order; and then if the
24 user wanted to update a section or a page or a chart,
25 they could go to our BBS, our bulletin board system,

1 download just the one chapter they were interested in
2 that might have been updated, print it, replace the
3 pages.

4 Q. And what is a bulletin board system, Mr. Novacek?

5 A. It's a way of connecting workstations together
6 over a long distance. It was connecting computers
7 together over very long distances. Like right here these
8 two are connected together through a nice little cable,
9 but I can't have a cable going to a user from Detroit to
10 San Francisco. So, you would connect a phone line to a
11 computer using a device called a "modem"; and you could
12 actually tell the computer to dial another computer. So,
13 if you ever heard the expression "dial out" or "dial in,"
14 that's where that came from.

15 So, back in the Nineties we exploited that
16 technology so that people could connect to our systems
17 readily to download things that we wanted to give them,
18 updates to the manual, new software, chat with our
19 technicians, chat with each other, another form of a
20 forum like you might hear today, or a blog, but in the
21 day they were called "BBSs."

22 Two others that we used that were public
23 forums, not just private forums, were CompuServe and
24 another one called "Prodigy."

25 Q. Why not just use the Internet?

1 A. There was no Internet in the form that we know it
2 today. There was one and I actually used it for things,
3 but it was not for the consumer.

4 Q. So, in 1995 if a DAD system purchaser got a
5 printed manual and wanted to update it with the latest
6 updates from ENCO, what would they do?

7 A. They would connect to one of the three places I
8 just mentioned, our BBS, CompuServe, or Prodigy, go to
9 the documentations section of the board, and look at the
10 dates on the chapters. So, if their entire manual was
11 dated, you know, August 14th, '95, and they see something
12 after August 14th, '95, they could download that one
13 file, very small, very quickly, print it, and update the
14 pages in their manual. We never shipped out updates to
15 the pages. We thought that would be a waste of paper.
16 So, we did it electronically.

17 Q. And how would they keep track of which versions of
18 each chapter they had?

19 A. Every page of the DAD manual has a date of when
20 that page is as of. So, again, with that August 14th
21 example, if I'm looking at a page and it says August 14th
22 and I look at the next page and it's August 27th, you
23 know, that's -- every page is stamped.

24 Q. And how long was it from the time that that date
25 was affixed to a particular page and chapter to the time

1 that it was made public?

2 A. Literally minutes.

3 Q. And how was it made public?

4 A. I gave Michelle Monroe, our tech writer, programs
5 that as soon as she was done, it would, by chapter, look
6 at what was changed, publish to the proper places just
7 the updated chapters.

8 Q. Now, let me get this straight. Was there a file
9 for each chapter?

10 A. Yes, there was.

11 Q. Could users of your bulletin board system also
12 download the entire manual?

13 A. Yes. The manual was so large we had to break it
14 up into two pieces so they were a little bit easier to
15 deal with. They were too large to be one file. So,
16 there were two files that comprised the entire manual,
17 updated every time the manual and any chapter was updated
18 and then all of the comprising chapters -- 18 I think in
19 the index -- there were 19 more files that were
20 individual chapters.

21 Q. Were there any restrictions on who could connect
22 to your bulletin board system and download the manuals?

23 A. Absolutely not.

24 Q. Any passwords or accounts required?

25 A. No.

1 Q. Is it the case, sir, that the system you're
2 talking about was in place in 1995 when these systems
3 were being offered for sale?

4 A. Yes.

5 Q. Mr. Novacek, if you could turn in the binder in
6 front of you to Defendant's Exhibit 1?

7 A. I'm sorry. I have no binder.

8 Q. I'm sorry.

9 MR. CORDELL: Your Honor, may I approach?

10 THE COURT: You may.

11 MR. STEPHENS: Thank you, Mr. Cordell. That's
12 the second time I've done that today. I apologize.

13 A. I'm sorry. Where am I going?

14 BY MR. STEPHENS:

15 Q. Defendant's Exhibit 1. It's the first tab in the
16 binder.

17 A. I'm there.

18 Q. Can you tell us what this is?

19 A. This is the DAD operation manual, Version 6.0A.

20 Q. And can you tell from looking at this -- well,
21 first, let me ask who created it.

22 A. ENCO created it.

23 Q. Can you tell from looking at this when the
24 chapters of this manual were published by ENCO to the
25 public?

1 A. Let me scan through it quickly.

2 Just doing a quick scan, the majority of this
3 manual is dated June 30th, 1995.

4 Q. And when would those pages have been made
5 available to the public by ENCO?

6 A. On June 30th, 1995.

7 Q. Okay. You said the majority of the pages. Are
8 there some other pages that have a different date?

9 A. Yes. I noticed a few of them in chapter 8 were
10 dated September 30th, '95.

11 Q. And when would those pages have been published by
12 ENCO?

13 A. On September 30th, '95.

14 Q. Okay. Any other dates in there?

15 A. I didn't see any. I can scan again. It's several
16 hundred pages. It's hard to --

17 Q. Just take a quick look.

18 A. (Perusing documents.)

19 Q. That's okay.

20 A. They look like they're those two dates.

21 Q. Okay. Thank you.

22 Were all of the pages in this manual published
23 by ENCO in 1995?

24 A. Yes, they were.

25 Q. On the first page, sir, it says "preliminary." Do

1 you see that?

2 A. Yes, I do.

3 Q. Why does it say that?

4 A. Every DAD manual says "preliminary" so that we
5 have the right to change it without notice.

6 Q. Okay. Does that mean it was not published --

7 A. No. Absolutely not.

8 Q. If we could go, sir, now to the tab in your binder
9 marked Defendant's Exhibit 85.

10 A. Yes.

11 Q. Can you tell us what that is?

12 A. Yes. This is a purchase order to ENCO from one of
13 our distributors, Harris Allied, and the corresponding
14 invoice from ENCO back to Harris for the system that they
15 ordered for one of their clients.

16 Q. How does that invoice relate to the system that
17 you demonstrated to the jury here today?

18 A. The software that we're actually running in the
19 demo is from this order.

20 Q. Okay.

21 MR. STEPHENS: Your Honor, may I approach?

22 THE COURT: You may.

23 BY MR. STEPHENS:

24 Q. Mr. Novacek, I'm handing you what's been marked
25 Defendant's Exhibit 87; and I believe that that exhibit

1 includes the system itself.

2 MR. HOLDREITH: Can I just have a look at
3 that?

4 MR. STEPHENS: Absolutely.

5 BY MR. STEPHENS:

6 Q. Mr. Novacek, can you tell the jury what I just
7 handed you?

8 A. These are the two installation disks from this
9 order that we're seeing on the screen.

10 Q. By "this order," you mean Defendant's Exhibit 85;
11 is that correct?

12 A. That's correct. We referred to it as Sales Order
13 Number 10164, which you see up in the upper right. And
14 written on these disks are the Sales Order 10164 in Dave
15 Turner's handwriting.

16 Q. And how did you get them back from Harris Allied?

17 A. I did not. I got them back from the engineer at
18 the University of Akron which you also see on the upper
19 right, Blake Thompson.

20 Q. How did you get them back from Mr. Thompson?

21 A. I let it be known on our forum that we were
22 looking for software and installation disks of the day
23 and Blake responded.

24 Q. What's the relationship between those disks and
25 the system you demonstrated for the jury?

1 A. The software that you saw running came from these
2 diskettes.

3 Q. Now, Mr. Novacek, you were deposed in this case;
4 is that right?

5 A. I'm sorry. I hit the mic. I didn't hear you.

6 Q. Your deposition was taken in this case; is that
7 right?

8 A. Yes, it was.

9 Q. I want to ask you a few questions about that
10 deposition. If you could turn in your binder to
11 Plaintiff's Exhibit 173.

12 A. Yes. I'm there.

13 Q. Can you tell us what that is?

14 A. This is my public profile page from a social
15 networking system known as *LinkedIn*.

16 Q. And did you create that page?

17 A. Yes, I did.

18 Q. When did you create that page?

19 A. Many, many years ago. I'm sorry I don't really
20 recall the date. When *LinkedIn* started. I was one of
21 the first members of *LinkedIn* when I found out about it.

22 Q. Now, near the bottom of the page it says Gene
23 Novacek's education and it says "MIT, MS engineering
24 management." Do you see that?

25 A. Yes, I do.

1 Q. Did you actually have an MS in engineering
2 management?

3 A. No, I did not.

4 Q. Why does it say that there?

5 A. When I created this profile, all they had in
6 *LinkedIn* for specifying your educational level were four
7 check boxes, high school, BS for bachelor's of science,
8 MS for master's, and PhD for doctorate. I felt that I
9 had gone through so much amount of energy getting toward
10 my masters, I was more than the bachelor's; so, I checked
11 off the master's check box.

12 Q. Have you ever held yourself out as having an MS
13 degree to employers?

14 A. Absolutely not.

15 Q. To customers?

16 A. No.

17 Q. To engineering colleagues?

18 A. No.

19 Q. Okay. If you could turn now, sir, in your binder
20 to the tab marked Plaintiff's Exhibit 174. Can you tell
21 us what that is, sir?

22 A. This is an email correspondence between me and
23 Hoyt Fleming, an email I sent to him and his response to
24 me back in May of 2006.

25 Q. Was that before this case?

1 Let me ask it differently. Did that relate to
2 this case?

3 A. No, not at all.

4 Q. Had you done some consulting for Apple at that
5 point?

6 A. Yes, I had.

7 Q. Now, in the lower email there is a sentence that
8 says, "I want to get a bunch of Apple items and was
9 wondering if there are any discounts available for team
10 members." What did you mean by that?

11 A. I didn't really know if there were any formal
12 discount plans at Apple. At ENCO we do have discount
13 plans for family, friends, employees, vendors, partners,
14 just like GM does for getting cars in the family, things
15 like that; and I was interested in getting a discount,
16 saving some money on getting some Apple items and was
17 hoping they might have something we could take advantage
18 of.

19 Q. Okay. If we could go next to the tab marked
20 Plaintiff's Exhibit 716 in your binder. What is that,
21 sir?

22 A. This is another email correspondence from me to
23 Hoyt Fleming in February of 2008.

24 Q. And it says the subject is "from left field."

25 A. Correct.

1 Q. Why does it say that?

2 A. Because it was completely different from anything
3 that I ever had communicated with Hoyt.

4 Q. And what were you communicating with Mr. Fleming
5 in this email?

6 A. As you can read, we were -- my wife and I were
7 interested in selling ENCO and we were talking with other
8 Apple-like companies -- Microsoft, *Google*, *Yahoo!* -- and
9 just didn't want to leave anybody out. We were looking
10 for any opportunity for, you know, a potential buyer and
11 thought Apple might be interested.

12 THE COURT: Counsel, we're going to take a
13 break.

14 Ladies and gentlemen, I'll ask you to be back
15 at quarter of.

16 (The jury exits the courtroom, 3:29 p.m.)

17 THE COURT: We'll be in recess until quarter
18 of.

19 (Recess, 3:30 p.m. to 3:45 p.m.)

20 (Open court, all parties present, jury
21 present.)

22 THE COURT: Go ahead, counsel.

23 MR. STEPHENS: Thank you, your Honor.

24 Can we have back up Plaintiff's Exhibit 716?

25 *

1 BY MR. STEPHENS:

2 Q. That's Exhibit 716 in your binder, Mr. Novacek.

3 A. Yes, I have it.

4 Q. You were talking about your interaction with
5 Mr. Fleming about selling ENCO before the break. Do you
6 recall that?

7 A. Yes, I do.

8 Q. Did you have any conversations with Microsoft or
9 Google or the other competitors you mentioned?

10 A. Yes, I did.

11 Q. Did your interaction with Apple about selling ENCO
12 ever go anywhere?

13 A. No, it did not.

14 Q. Do you still own ENCO today?

15 A. Yes, I do.

16 Q. Now, Mr. Novacek, are you an intellectual property
17 lawyer?

18 A. No, I'm not.

19 Q. If we could turn to the first page of Defendant's
20 Exhibit 1. Do you see the little circle Rs there on the
21 first page -- Rs in a circle?

22 A. Yes, I see them.

23 Q. What are those for?

24 A. The circle R indicates registered trademark, I
25 believe.

1 Q. Do you know what's required to register a
2 trademark?

3 A. Not really, no.

4 Q. Does ENCO have any registered trademarks?

5 A. I honestly don't know.

6 Q. Do you know why the circle R is on the front page
7 of your manual?

8 A. Because my vice-president of sales and marketing
9 wanted them there to make it look more realistic or
10 impressive. I don't know. I was responsible for the
11 contents. Beyond that...

12 Q. Was DAD486 a name that you used as a brand for
13 your product?

14 A. Yes, it was.

15 Q. Was ENCO thinking about applying for patents back
16 in this time, 1995 or so?

17 A. Actually much earlier than that, yes.

18 Q. Did you talk to a patent lawyer at the time?

19 A. Yes, we did.

20 Q. Did you -- did ENCO actually file any patent
21 applications at the time?

22 A. No, we did not.

23 Q. Why not?

24 A. We simply couldn't afford it.

25 Q. Now, at the bottom of the page there, on

1 Defendant's Exhibit 1, it says "U.S. and Foreign Patents
2 applied for." Do you see that?

3 A. Yes, I do.

4 Q. Why does it say that?

5 A. Honestly because we didn't know better. This was
6 again Larry Lamoray, L-A-M-O-R-A-Y -- was my VP of sales
7 and marketing -- wanted to make it look very real,
8 impressive to potential clients like CNNs and things of
9 the world. Just didn't know better.

10 Q. Now, in your deposition you were asked if you
11 wanted Apple to win this case. Do you remember that?

12 A. Yes, I recall that question.

13 Q. What did you say?

14 A. Something to the effect that it didn't really
15 matter to me that Apple won, more importantly that the
16 plaintiff lose.

17 Q. Why?

18 A. I just have a real hard time with how they were
19 doing what they were doing.

20 Q. And what was your problem with it?

21 MR. HOLDREITH: Objection, your Honor.

22 Relevance.

23 THE COURT: Sustained.

24 MR. STEPHENS: I'll move on, your Honor.

25 *

1 BY MR. STEPHENS:

2 Q. Mr. Novacek, is there a name for the two different
3 ways you were running the DAD system here?

4 A. If you're referring to the modes, yes.

5 Q. And what were those modes?

6 A. Network mode or local mode, and local mode was
7 also known as "standby mode."

8 Q. Okay. And why would people use standby mode?

9 A. In the day, in the Nineties that we're referring
10 to, networks weren't as trustworthy, as robust as they
11 are today. Some professional broadcasters questioned the
12 stability of a network. So, they wanted to use networks
13 to move audio files and playlists around a facility when
14 they had many workstations to work with; but when it came
15 to actually playing it on the air, they wanted to remove
16 the network component and play it completely locally on
17 the on-air machine itself. And that's still done today.

18 Q. I'd like to look back at the manual, Defendant's
19 Exhibit 1, at page 330, which also has the number 17-12
20 on it.

21 A. One moment.

22 Yes. I'm there.

23 Q. What's shown on this page?

24 A. We referred to this as the "Database Layout page."

25 Q. And what does it show?

1 A. There are two primary databases in DAD of that
2 time; and we wanted to share with our users how we
3 structured those databases so in case they wanted to use
4 them, know about what was in them, we were very open
5 about how we created and maintained those databases. So,
6 the two databases, the one on the left the cuts database,
7 and on the right is the playlist database.

8 Q. And what is the "cut" line there, Field Number 1,
9 shown on the right side under the
10 \dad\files\playlist*dbf?

11 A. Yes. The "cut" refers to the five-digit cut
12 number which was a unique number for every audio file
13 within the system.

14 Q. Was that used to locate the audio file?

15 A. Yes.

16 Q. And down at Field Number 12, is that the type code
17 you referred to in your testimony?

18 A. Exactly.

19 Q. And how are those type codes used when playing
20 back a playlist?

21 A. If you could open up the lower portion of the
22 screen -- there you go -- and maybe highlight those type
23 codes on the bottom, those are -- the three types that I
24 referred to in my demo, the P type, the normal P play
25 time is an audio file, something to play.

1 The C, comment type, was that white block you
2 saw that said "read the weather now." So, that was a
3 comment type.

4 The other type I showed you was a T, timed
5 type, which had the hard branch at 19:00, do something at
6 7:00.

7 So, I showed three different types; and there
8 are eight types there --

9 Q. Mr. Novacek, how do you feel about DAD?

10 A. How do I feel about it? I love DAD. It is such
11 an important part of my family. It's a third child.
12 It's --

13 Q. Go ahead, sir.

14 A. I could go forever.

15 Q. Are you proud of it?

16 A. Yes, very much so.

17 Q. Thank you very much, Mr. Novacek.

18 MR. STEPHENS: I'll pass the witness.

19 Your Honor, if I may, I'd like to move
20 Defendant's Exhibit 87 into evidence. I don't know if it
21 was objected to or not.

22 MR. HOLDREITH: That's the machine?

23 MR. STEPHENS: The machine and the disks.

24 MR. HOLDREITH: Well, your Honor, we have no
25 objection to the demonstration that was given here. I'm

1 not sure it's appropriate to have the machines go into
2 evidence.

3 THE COURT: Seeing as they can't go up anyway,
4 I may allow you to substitute photos later on; but
5 they're not -- we're not filing those things downstairs
6 in the evidence locker. I can tell you that right now.

7 MR. STEPHENS: Fair enough, your Honor.
8 Photos are fine.

9 MR. HOLDREITH: Your Honor, may I deliver a
10 witness binder to Mr. Novacek?

11 THE COURT: You may.

12 MR. HOLDREITH: Thank you.

13 CROSS-EXAMINATION OF EUGENE NOVACEK

14 BY MR. HOLDREITH:

15 Q. Good afternoon, Mr. Novacek.

16 A. Good afternoon.

17 Q. Now, I took your deposition about three months ago
18 in this case, right?

19 A. Correct.

20 Q. And I asked you some questions?

21 A. Yes, you did.

22 Q. And you gave me some answers?

23 A. Yes, I did.

24 Q. And you were under oath?

25 A. Yes, I was.

1 Q. And you tried to tell the truth?

2 A. I did tell the truth.

3 Q. And -- exactly. And that deposition happened in
4 Cupertino, California.

5 A. That's correct.

6 Q. It was on April Fools Day.

7 A. (Pausing.)

8 Q. You may not remember that.

9 A. I don't remember that, but it was March 31st or
10 April 1st.

11 Q. And Cupertino is where Apple's headquarters is?

12 A. Yes.

13 Q. And the deposition was at Apple's headquarters?

14 A. Yes, it was -- not the headquarter building. One
15 of their buildings, yes.

16 Q. One of their buildings.

17 A. Yes.

18 Q. Exactly.

19 Now, Mr. Novacek, are you just a neutral
20 witness here to tell the facts as best you can?

21 A. Yes.

22 Q. But at your deposition -- if you'd turn in your
23 binder, there is a copy of the transcript. It's at the
24 back of the folder. There is a tab that says "Novacek
25 depo." And I tried to put some numbered tabs in it to

1 help you find your place.

2 A. Yes.

3 Q. And at 1, Tab 1, if you look -- there's a few
4 different excerpts here; so, I lettered them to try to
5 help you out. There's 1A on page 115. Do you see that?

6 A. Yes, I do.

7 Q. And at line 5 --

8 MR. STEPHENS: Your Honor, could you instruct
9 the counsel to use page numbers, please?

10 THE COURT: He just did. 115.

11 MR. STEPHENS: Oh, I'm sorry. I thought he
12 was talking about Tab Number 115.

13 BY MR. HOLDREITH:

14 Q. At page 115 at line 5, I said, "It's fair to say
15 you were trying to help Apple defeat Personal Audio in
16 this case, right?"

17 And you said, "Yes." Did I read that right?

18 A. Yes.

19 MR. STEPHENS: Your Honor, he's just reading
20 the deposition. There is no question about this.

21 THE COURT: Overruled.

22 BY MR. HOLDREITH:

23 Q. And as Mr. Stephens asked you, Apple's paying you
24 in this case?

25 A. Indirectly, yes.

1 Q. Exactly. The checks are coming from Mr. Stephens'
2 law firm.

3 A. That's correct.

4 Q. And those checks are for \$500 an hour?

5 A. Yeah, that's correct.

6 Q. And so far you've been paid -- did you say
7 \$100,000?

8 A. 103.

9 Q. 103.

10 And that's in addition to the \$75,000 Apple
11 paid for these two machines, right?

12 A. That's correct.

13 Q. And they bought these two machines to help out in
14 another patent case?

15 A. No.

16 Q. That's not your understanding?

17 A. That's -- that's not the case.

18 Q. Okay. Now, I'd like to look at Plaintiff's
19 Exhibit 174 again. I've got a copy of it in my binder as
20 well. I don't know if you still have it from
21 Mr. Stephens' binder. You can look in either one.

22 Do you have that open in front of you?

23 A. Not quite yet. Hold on.

24 Q. Okay. That's fine. I'll wait for you.

25 A. Yes, I'm there.

1 Q. Okay. And this was an email that Mr. Stephens
2 talked to you about.

3 A. That's correct.

4 Q. Now, this is from a gentleman named Mr. Hoyt
5 Fleming, right?

6 A. That's correct.

7 Q. And his address here is "@parklegal"?

8 A. That's correct.

9 Q. Do you understand Mr. Fleming is some kind of
10 lawyer for Apple?

11 A. Not directly working for -- yes, he's an
12 Apple *[sic]* that works on behalf of Apple, yes.

13 Q. He's a lawyer, and he works on behalf of Apple.

14 A. Yes.

15 Q. And he's worked with you from time to time?

16 A. Yes, he has.

17 Q. And what you said to Mr. Fleming here -- what you
18 said is "I want to get a bunch of Apple items," right?

19 A. Yes.

20 Q. And I "was wondering if there are any discounts
21 available for team members." That's what you said. Did
22 I read that right?

23 A. Yes, you did.

24 Q. And you were asking for a discount for yourself,
25 right?

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1 A. Ultimately. I didn't say that verbatim there. I
2 was wondering if there was a team discount program at
3 all, with the goal on trying to get a discount on some
4 things, yes.

5 Q. You said, "I want to get a bunch of Apple items,"
6 right?

7 A. Yeah, but I didn't say I wanted to get a discount.

8 Q. Well, you weren't -- you were saying "I want to
9 get Apple items, and I wonder if there is a discount for
10 team members." That's what you said, right?

11 A. Correct.

12 Q. Okay. Now, as you told Mr. Stephens, you are not
13 an expert in patent law, right?

14 A. Absolutely not.

15 Q. Or how to determine if a patent claim is valid?

16 A. No. I don't know how to do that.

17 Q. Right.

18 And, sir, you have not read any of the patents
19 in this case, right?

20 A. No, I have not.

21 Q. And you've not read the definition of the claims
22 in this case. That's a court document that defines the
23 patent claims. You've not read that?

24 A. No, I have not.

25 Q. Okay. I'd like to talk to you for a moment about

1 source code. Okay?

2 A. Okay.

3 Q. You've not been in the courtroom for most of this
4 trial, correct?

5 A. Not for any of it.

6 Q. Not for any of it.

7 So, you're not aware whether source code is
8 something that's important in this case or not?

9 A. That's correct. I don't know.

10 Q. I'd like you to turn to Tab 2 in your deposition
11 transcript at the end of your binder. I'm going to ask
12 you about page 328. Let me know when you're there.

13 A. I am there.

14 Q. Okay. On page 328 you said -- I asked you, "Have
15 you provided any source code to Apple?"

16 I was asking about DAD486 source code.

17 And you said, "No, I have not"; is that right?

18 A. That's correct.

19 Q. And you haven't?

20 A. I have not.

21 Q. And I asked, "Have you provided any source code to
22 me"; and you have not?

23 A. I have not.

24 Q. And I asked, "Have you provided any source code to
25 Dr. Wicker?"

1 A. Correct.

2 Q. And you have not?

3 A. I have not.

4 Q. And I asked you if Dr. Wicker asked you to look at
5 any source code, if he could look at any DAD source code;
6 and you told me he had not asked you that, right?

7 A. That's correct.

8 Q. And we don't have any DAD source code here in
9 court, do we?

10 A. No, we do not.

11 Q. Okay. Now, I did ask you -- and I'd point you to
12 page 12 of your deposition transcript. I'll wait until
13 you get there.

14 A. I'm sorry. Am I looking for a yellow marker 12?

15 Q. I'm sorry. I didn't have a tab for this one. I
16 wasn't sure if it would come up. It's page 12. So, it's
17 two full pages in, since these are the little quarter
18 pages.

19 A. I see.

20 Q. Are you with me?

21 A. Yes. I'm there.

22 Q. At line 11 I asked you, "Do you, Mr. Novacek, have
23 in your possession now a copy of the source code for any
24 version of DAD486x?"

25 And you said, "Yes, I do."

1 A. Yes.

2 Q. That's what you said?

3 A. Yes, I did.

4 Q. All right. Now, Mr. Novacek, DAD was designed
5 initially by a television engineer for television, right?

6 A. No.

7 Q. Isn't that what you told me at your deposition?

8 A. He was a co-designer, co-inventor. I had nothing
9 to do with broadcasting. I designed much of it. I'm
10 sorry I don't understand the question.

11 Q. Sure. Why don't you turn to page 91. It's at the
12 Tab Number 3 of your deposition. Page 91. And at
13 line 21 --

14 Are you there?

15 A. Yes, I'm there.

16 Q. -- I asked you, "The DAD was designed by a
17 television engineer for television?"

18 And you said, "Correct, initially."

19 A. Yes. Now I understand.

20 Q. And that's true?

21 A. Right.

22 Q. And the manual -- if you turn to page 16, and it's
23 the big thick document in your witness notebook. It's
24 Plaintiff's Exhibit 706. And if you go to page 16 of
25 that manual -- and these are little Roman numbers; so,

1 I'm going to put it up on the screen for you. But it's
2 also numbered 16 in the exhibit.

3 This is a page from the DAD manual that you
4 wrote, right?

5 A. That's correct.

6 Q. And what you wrote here is, the "unit has been
7 specifically designed to meet the operational needs of
8 both live broadcast and studio production." Did I read
9 that right?

10 A. Yes, you did.

11 Q. Okay. And it's fair to say that the DAD manual,
12 this document Plaintiff's Exhibit 706, it's directed at
13 radio stations and TV broadcasters, right?

14 A. Not only them. It's directed at them and any DAD
15 user.

16 Q. Well, this is something we talked about at your
17 deposition again, right? Didn't you tell me it was
18 directed at radio stations and TV broadcasters?

19 A. Yeah, and I just agreed with you it is, but not
20 only them.

21 Q. Right. Now I'd like to talk to you a little bit
22 about skipping around in the DAD. Okay? Using the DAD
23 machine and the idea of skipping music. Okay? Or
24 skipping programs.

25 A. Okay.

1 Q. All right. And if you could turn to Tab 4 of your
2 deposition transcript at page 316 -- excuse me -- 318.

3 A. I'm there.

4 Q. All right. You were familiar with CD players that
5 have a button to skip forward to the next track by
6 pushing that button, right?

7 A. Yes, I am.

8 Q. And they have a different button that lets you
9 skip back to a previous track by pushing that button,
10 right?

11 A. Some did, yes.

12 Q. And you were aware of those buttons when you
13 designed the DAD system, right?

14 A. Yes, we were.

15 Q. And you were aware of those buttons when you
16 designed the DAD interface?

17 A. Yes, I was.

18 Q. Skip back and skip forward, right?

19 A. Correct.

20 Q. But you decided it would be best for your product
21 to just have a "next" button and not to have a separate
22 "skip forward" or "skip"back" button on the interface,
23 right?

24 A. That's correct.

25 Q. And, in fact, you thought about this; but what you

1 wanted to do was implement something like a cart machine,
2 not something with CD controls.

3 A. We wanted the combination of them. We just left
4 out the controls we didn't think that would be that
5 needed.

6 Q. And you looked at how you wanted to implement a
7 cart or a CD and there's really no "skip to next" or
8 "previous" on a cart machine, right?

9 A. No, not in the way you're describing it.

10 THE COURT: Counsel.

11 MR. HOLDREITH: Yes, sir.

12 THE COURT: Are you saying cart, C-A-R-T?

13 MR. HOLDREITH: C-A-R-T, yes, sir.

14 THE COURT: And do you perhaps want, for the
15 record, to say what that is?

16 MR. HOLDREITH: That is exactly what I'm going
17 to do now. Thank you, your Honor.

18 BY MR. HOLDREITH:

19 Q. Mr. Novacek, a cart machine are those machines in
20 radio stations that have a stack of tapes in them and the
21 people in the radio station can push buttons to play one
22 tape after another. That's one kind of cart machine,
23 right?

24 A. It's one kind.

25 Q. And on the DAD system, you were trying to replace

1 the cart machine with an electronic system?

2 A. As well as other things, that was one of our
3 goals, yes.

4 Q. All right. Another thing that you could have done
5 in the DAD machine if you wanted to was you could have
6 written code so that when you push that "next" button --
7 you showed us a "next" button, right?

8 A. Yes.

9 Q. You could have written code so that when you
10 pushed the "next" button, it first increments the
11 position variable that you talked about by one and then
12 goes to the incremented song to play it, right?

13 A. Yes.

14 Q. And you chose not to do that, right?

15 A. I'm sorry. I've now gotten confused.

16 Q. Sure.

17 A. I thought you just agreed with -- I agreed with
18 what you said and --

19 Q. You chose not to write it that way.

20 A. You have to repeat it because I believe I did
21 write it that way; so, I must have misunderstood your
22 initial question.

23 Q. Oh, I'm sorry. Could you look at page 316 of your
24 deposition. It's just the facing page that you've got
25 open.

1 A. Yes.

2 Q. It's the Excerpt 4A on 316, starting at 10. And I
3 said, "You could have written the code so that when you
4 pushed the 'next' button it first increments the position
5 variable by one and then goes to that incremented song to
6 play it," right?

7 And you started off by saying you could have
8 written the code that way.

9 I said, "Right."

10 You said, "Are you asking me if I did write
11 the code that way?"

12 And I said, "I understand you did not write it
13 that way; is that correct?"

14 You said, "All right. We did not write it
15 that way, and we could have --"

16 That's what you said, right?

17 A. Bear with me for a moment. I'm confused by -- can
18 I just read this quietly for a minute?

19 Q. I'm just asking you if I'm reading your answers
20 correctly.

21 A. Oh, yeah. In regard to that, you've read exactly
22 what's in the transcript exactly how it's stated.

23 Q. And then you went on and you said, "No, we
24 wouldn't -- we -- we could not have done it the way
25 you're describing because it wouldn't give me the desired

1 result that I wanted." That's what you said, right?

2 A. Yes, I said that.

3 Q. Now, Mr. Novacek, you didn't show in your
4 demonstration just now with that "next" button -- you
5 didn't show any kind of timer where if you'd put that --
6 push that "next" button before 3 seconds or after
7 3 seconds, it does something different, right?

8 A. I did not show that, no.

9 Q. Right. Now, I want to talk to you about the
10 manual a little bit more; and that's Plaintiff's
11 Exhibit 706. It's really the same thing as Defendant's
12 Exhibit 1 that you were looking at with Mr. Stephens.
13 I'm just using the plaintiff's exhibit because I have bar
14 codes that help me get to pages. Okay?

15 A. I'm there.

16 Q. So, this is the first page of the DAD486 manual
17 that's Plaintiff's Exhibit 706, right?

18 A. Yes, it is.

19 Q. Now, there are a number of places here that have
20 this "registered" symbol for the copyright, right?

21 A. Yes, there are.

22 Q. And did you say somebody at your organization, you
23 thought, wanted that there to make it look better?

24 A. Yes, I said that.

25 Q. Okay.

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1 A. I also said I didn't know if it was really done,
2 regarding the registered trademarks.

3 Q. Exactly. And you also said down here where it
4 says "U.S. and Foreign Patents applied for," that's not
5 true, is it?

6 A. That's correct.

7 Q. But somebody wanted to put it there to -- because
8 somebody thought it would look good. Is that what you
9 said?

10 A. Yes, I did.

11 Q. And then you said the reason you put something on
12 there that's not true, because you thought it would make
13 you look good is because you didn't know better?

14 A. That's correct.

15 Q. And you never did actually file for a patent on
16 this DAD system --

17 A. Not for DAD, no.

18 Q. Now, Mr. Novacek, isn't it true that this
19 particular version of the DAD manual -- you don't know if
20 this particular version was distributed to anyone?

21 A. This is not a particular version. This is a
22 mixture of versions. I'm not quite sure what your
23 question is.

24 Q. Exactly. This document, Exhibit 706 in this form,
25 you don't know if anybody was ever given this set of

1 pages printed out.

2 A. Yes, I am.

3 Q. At least not in 1995.

4 A. Yes, I am. The dates of June, '95, on most of
5 these pages were made available. They were printed.
6 They were sold, included with sales. So, everything
7 that's on June, '95, was distributed electronically and
8 in printed form.

9 Q. Didn't you say it's possible that you created
10 versions of the DAD486 manual and then changed them
11 again, updated them, before anyone ever got that version?

12 A. Yes, I did say that.

13 Q. Okay. And it's possible that happened with this
14 version, right?

15 A. Very unlikely because this was such a prominently
16 distributed and monumentally changed version. The reason
17 it's 6.0A is because we just came off of 5.9. When we
18 made big changes, everybody got them.

19 Q. But you don't know if this one with these pages
20 was distributed without some changes having been made?

21 A. Actually, I do. We checked the bulletin board
22 logs to see who downloaded what manuals when -- and I
23 believe they were provided to you as well -- and could
24 see that people had downloaded many versions of -- many
25 chapters of this manual all throughout the summer of '95.

1 Q. Some chapters of this manual?

2 A. Yes.

3 Q. Okay. And I have not seen that log; but if you
4 say so --

5 A. Including the overall manuals which included
6 everything that you're seeing in June, '95, the 6.0A
7 stuff. So, yes, they were downloaded.

8 Q. All right. Fair enough.

9 I have a couple questions that may become
10 important; so, just bear with me. It may not make a lot
11 of sense right now. Can you turn to page 4-11 of
12 Plaintiff's Exhibit 706?

13 MR. HOLDREITH: And for the record, that is
14 page 83 of Plaintiff's Exhibit 706.

15 I'll put it up on the screen.

16 BY MR. HOLDREITH:

17 Q. Are you with me?

18 A. Yes, I am.

19 Q. And this page has a paragraph called "Location."
20 It's paragraph H. Do you see that?

21 A. Yes, I see it.

22 Q. And that paragraph talks about selecting where the
23 audio data being recorded will be sent for storage,
24 right? See that?

25 A. Yes, I see it.

1 Q. Now, at your deposition you explained that this
2 section has nothing to do with where files will be copied
3 if you try to copy a file from another location, right?

4 A. I recall that, yes.

5 Q. And that's true?

6 A. That's correct.

7 Q. All right. Could you also look, sir, at page 330
8 of Plaintiff's Exhibit 706, which internally it's
9 numbered 17-12? That's something Mr. Stephens asked you
10 about.

11 A. I'm sorry. You must be referring to it
12 differently. Where am I going again?

13 Q. 17-12.

14 A. Oh, yes.

15 Q. And at your deposition you explained to me that
16 this page does not say anything about which hard drive
17 playlists are stored on, right?

18 A. That's -- I don't remember saying that; but I
19 believe if you asked me right now, that's exactly what
20 I'd say. This page does not describe where -- which hard
21 drive they're stored on.

22 Q. That's a true statement?

23 A. It's a true statement.

24 Q. All right. That may become important later. I
25 appreciate your answers.

1 A. Okay.

2 Q. Mr. Novacek, you demonstrated at least some
3 version of these two computers and the DAD software at
4 your deposition, right?

5 A. Yes, the same version.

6 Q. Well, one of the things that we looked at at that
7 deposition is that some of the files had dates that said
8 they had been modified in the future, in October of 2011.
9 Do you recall that?

10 A. Yes, I remember that.

11 Q. And you weren't sure what happened there, whether
12 somebody had messed around with the system dates, right?

13 A. I don't remember -- I don't recall exactly what I
14 told you. I have an idea of how that occurred.

15 Q. Might have been somebody changing system clocks
16 and system dates?

17 A. No, very unlikely on this. And I don't remember
18 if I explained it to you then, but I can explain it to
19 you now.

20 Q. That's all right.

21 So, in any event, those dates -- they were not
22 possible dates, right? Obviously this thing can't travel
23 to the future.

24 A. They are possible dates; but no, it can't travel
25 to the future -- yet.

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1 Q. And that system had been in the possession of
2 Apple and its lawyers for a couple of years prior to
3 that?

4 A. Prior to the depo, yes.

5 Q. Okay.

6 A. But those dates were there before we delivered it
7 to Apple.

8 Q. Okay. Now, Mr. Novacek, the software on these
9 machines that you demonstrated, that's a different
10 version from what's in this manual, right?

11 A. (Pausing.)

12 I just want to make sure I've heard you
13 correctly. I'll restate it. The software that's running
14 on there is slightly newer than this manual.

15 Q. It's later in time?

16 A. Later in time. This is primarily June and a
17 little of September of '95, and the date of the software
18 on there is August of '95.

19 Q. Okay. But you loaded that software -- you copied
20 that software onto those machines in October, 2010,
21 right?

22 A. I think it was September of 2010.

23 Q. Fair enough. September of 2010.

24 Now, a couple more questions that might not
25 seem very important right now. They might become

1 important later. I just want to verify a couple of
2 things.

3 A DAD software runs on a certain letter drive,
4 like C or F, right?

5 A. That's correct.

6 Q. And in this example, the C drive is the local
7 on-air machine, right?

8 A. That's correct.

9 Q. And the F drive is the network machine, right?

10 A. The server's hard drive, yes.

11 Q. Or server.

12 And DAD can only use the library that's on the
13 same drive as the DAD program. That's just how the
14 program works, right?

15 A. Yes. In regards to the library, that's correct.

16 Q. Okay. And is it also true that DAD can only find
17 playlists when it's retrieving a playlist to play that
18 are on the same hard drive as the DAD program?

19 A. When it's actually implementing and playing a
20 playlist, that's correct.

21 Q. Okay. Now, I'd like to talk about "Playback
22 Lookahead" for a minute.

23 A. Okay.

24 Q. That's something that you demonstrated here,
25 right?

1 A. Yes, I did.

2 Q. And that's something described in the manual at
3 page 12-9, and that's Plaintiff's Exhibit 706 at
4 page 283.

5 A. Yes. I'm there.

6 Q. So, I now put on the screen page 12-9 of the DAD
7 manual, right?

8 A. Yes.

9 Q. And it says "playback_lookahead," right?

10 A. Yes, it does.

11 Q. And what the manual says is that
12 playback_lookahead is useful "when network traffic may
13 experience a temporary (1/2 second or less) dropout of
14 audio during database-intensive operations such as
15 PURGE."

16 That's what it says, right?

17 A. Yes.

18 Q. And it says, "In the rare event that this should
19 happen, a user may activate Playback Lookahead," right?

20 A. Yes.

21 Q. All right. Now, playback_lookahead, that function
22 does not copy playlists, right?

23 A. That's correct. It does not.

24 Q. It temporarily moves audio programs and it plays
25 them and then it deletes them.

1 A. No. You're not stating that quite accurately.

2 Q. All right. Well, let's look at the manual. It
3 says, "This feature copies audio files from the network
4 to the local hard drive in the background." Did I read
5 that right?

6 A. Yes.

7 Q. "Then plays the cut." Did I read that right?

8 A. Yes.

9 Q. And then it says, "The local cut is then
10 discarded." Did I read that right?

11 A. Yes.

12 Q. And that's what the manual says?

13 A. Yes.

14 Q. And, Mr. Novacek, just to be clear, if you have
15 playback_lookahead activated when you're in network mode
16 and you're running playback_lookahead, it does not cause
17 the workstation to copy a playlist from the network drive
18 to the local drive, right?

19 A. That's correct.

20 Q. Okay. Now, let's talk about the import function.
21 That's something else that you demonstrated, right?

22 A. Yes, I did. I did demonstrate that.

23 Q. And that's in the manual at -- I believe it's
24 Plaintiff's Exhibit 706 at 191.

25 A. Do you have a regular page number for me?

1 Q. Yeah. I think your page number is going to be
2 7-19.

3 A. Yes. I'm there.

4 Q. Are you with me?

5 And is that the page that describes import?

6 A. Yes, it does.

7 Q. Okay. And import playlist is what you
8 demonstrated here today, right?

9 A. Not the import playlist that's highlighted on that
10 page, no.

11 Q. Okay. This is a --

12 A. There's two imports.

13 Q. There's two different imports?

14 A. Yes.

15 Q. Let's talk about this one. There is some further
16 description of import playlist on page 7-20, the next
17 page, right? The description continues.

18 A. Yes.

19 Q. All right. Now, you explained to me at your
20 deposition that the import function takes an import file
21 and translates it into a new file that's a DAD playlist,
22 right?

23 A. I don't believe I said it translates an import
24 file. I think I said it translates a file from another
25 system or another DAD. I don't believe I said exactly

1 what you just said but...

2 Q. Okay. But in any event, the import function takes
3 a file from another computer; and it imports it into the
4 RAM, the working memory, of the DAD workstation, right?

5 I'll be technically accurate. What happens is
6 DAD reads the import file into its RAM, right?

7 A. No.

8 Q. Okay.

9 A. That's -- we're talking about two different
10 things. That's not correct.

11 Q. Okay. Let's look at page 138 of your deposition,
12 please.

13 And RAM is a kind of working memory; is that
14 right?

15 A. Yes. It's volatile, non-hard-drive-based memory,
16 fast, small.

17 Q. Okay. And, so, at page 138 of your deposition,
18 line 19, I asked you a question. I said, "In the
19 situation where the user has highlighted a source file
20 and chosen the import function, does DAD copy the source
21 file to its native drive?"

22 And you said, "No."

23 Did I read that right?

24 A. I see. I understand what you're saying now, yes.

25 Q. And you said, "Not to the native drive. It copies

1 it, downloads it from wherever the location might be, to
2 the local workstation but not to the hard drive," right?

3 A. Yes. But that's not what you said just before we
4 went to page 138.

5 Q. All right. I apologize. Let's just complete
6 this, then, and I'll just read it the way we said it and
7 then I won't make a mistake.

8 A. That's fine.

9 Q. I said, "Okay. When you say 'to the workstation'
10 you mean in working memory?"

11 And you said, "Yes," right?

12 A. Specifically about the source file, yes.

13 Q. And I said, "Okay. It doesn't store it in a hard
14 drive."

15 And you said, "Not in a persistent manner,
16 no."

17 Correct?

18 A. Not the source file.

19 Q. Right. At any point during an import -- sorry. I
20 said, "At that point during an import, DAD will perform
21 the translation in working memory," right?

22 A. Only if the source file required it to do so. You
23 hadn't asked me about what type of source file; so,
24 it's -- you know, it may or may not, depending on the
25 type of source file it was.

1 Q. Okay. What you said here -- I said, "At that
2 point during an import, DAD will perform the translation
3 in working memory --"

4 And you said, "Correct."

5 A. For the type that you were referring to, yes.

6 Q. And that's what you said, right?

7 A. Yes.

8 Q. Okay. Now, you would agree, Mr. Novacek, wouldn't
9 you, that the DAD manual doesn't tell you whether the
10 files you're importing come from the same machine where
11 you're doing the import or from a different machine,
12 right?

13 A. I don't recall if we specifically stated that in
14 the manual, no. But it did, which I just showed you.

15 Q. Well, let me ask you about page 75 of your
16 deposition now. I was asking you about a particular
17 section of the DAD manual, and I'll show it to you. It's
18 page 330 again. We've been talking about that. So, this
19 is Plaintiff's Exhibit 706 at page 330.

20 Have you caught up to me on the deposition?

21 A. I've got the deposition. I'm grabbing 330 at the
22 same time.

23 Q. Okay. I've put it up on the screen here.

24 A. Okay, yes. I have them both.

25 Q. And this is 17.8, it says at the top of this page,

1 right?

2 A. Yes, the database layout.

3 Q. Okay. So, I asked you in your deposition on
4 page 75 at line 24, "Now, there's some text at the top of
5 the page under the Index 17.8. Do you see that?"

6 You said, "Yes, I do."

7 I said, "It says, 'Data files for the cuts
8 database and the playlist database may be prepared
9 outside of the DAD486 program, and imported for use
10 within DAD.'" I said, "Do you see that?"

11 You said, "Yes, I do."

12 I said, "Okay. Does this sentence tell you
13 anything about whether these data files are prepared on
14 the same machine that's running DAD? In other words,
15 could you be -- you could run a program on the same
16 workstation, different program, and prepare a data file?"

17 And you said, "Yes, you could."

18 And I said, "Okay. So, as described in this
19 sentence, it's possible that the data files that are
20 being prepared outside the DAD486 program are prepared on
21 the same machine that is running DAD."

22 And you said, "It could be that way, yes."

23 That's what you said, right?

24 A. Yes, I did.

25 Q. Okay. I just have one other question for you,

1 Mr. Novacek. When you -- you did some demonstration
2 here, and you made a playlist. I think you searched for
3 the word "love" maybe. Was that it?

4 A. That's correct.

5 Q. And then you selected some songs; and you put them
6 in a playlist, right?

7 A. Yes, I did.

8 Q. That was running DAD on the C drive locally on
9 that same machine, right?

10 A. At the point in time in the demonstration, I was
11 connected only to the C drive, yes.

12 Q. So, you --

13 A. The same thing would occur on the network.
14 Doesn't really matter which mode you're in for that
15 operation.

16 Q. But what you showed us is you made the playlist on
17 that machine?

18 A. I was in the process of creating a playlist on the
19 local machine because that's the mode I was in. But it
20 works the same way in both modes.

21 Q. But what you showed is on that machine. You
22 didn't make it on a different machine?

23 A. No, but I could have.

24 Q. All right.

25 MR. HOLDREITH: Pass the witness.

1 THE COURT: You may step down, sir.

2 Next witness?

3 MR. STEPHENS: Your Honor, may I do some
4 redirect?

5 THE COURT: I think given the circumstances
6 surrounding his testimony and so forth, you've gotten
7 what you asked for.

8 MR. STEPHENS: Understood, your Honor.

9 THE COURT: Who is the next witness?

10 THE WITNESS: Should I leave?

11 THE COURT: You may step down, sir.

12 THE WITNESS: Should I leave this stuff here
13 or take it with me?

14 THE COURT: Counsel, you may want to change
15 out the books and so forth.

16 Who is the next witness?

17 MR. CORDELL: Our next witness is our expert,
18 your Honor, Dr. Steve Wicker.

19 THE COURT: Okay. Please step forward.

20 You may want to start taking down these
21 computers, too, or at least turn them off. We can move
22 them out at 5:00 when we break.

23 (The oath is administered.)

24 MR. CORDELL: Your Honor, may I make a brief
25 transitional statement?

1 THE COURT: You may.

2 MR. CORDELL: Ladies and gentlemen, you're now
3 going to hear from Dr. Steve Wicker who is our technical
4 expert and he is going to explain to you how all of the
5 infringement evidence you've heard from Apple's
6 witnesses, their engineers, applies to the patent and
7 he'll, I hope, demonstrate how, in fact, the Apple
8 products do not infringe. He'll also address the
9 invalidity evidence and explain how that -- the prior art
10 applies to the patents and, again, I hope will
11 demonstrate that the patents are invalid.

12 His testimony is going to be presented by Ben
13 Elacqua who lives in Houston with his wife and five
14 children. And, so, with that, I'll turn it over to Ben.
15 Thank you.

16 MR. ELACQUA: May I approach, your Honor?

17 THE COURT: You may.

18 MR. ELACQUA: Good afternoon, ladies and
19 gentlemen.

20 May it please the court?

21 THE COURT: Counsel.

22 DIRECT EXAMINATION OF STEPHEN WICKER

23 CALLED ON BEHALF OF THE DEFENDANT

24 BY MR. ELACQUA:

25 Q. Good afternoon. Please introduce yourself to the

1 jury.

2 A. Good afternoon. My name is Stephen Wicker. I'm a
3 professor at Cornell University where I teach electrical
4 and computer engineering and computer science.

5 Q. Where are you from, Dr. Wicker?

6 A. I'm originally from a small town south of Jackson,
7 Mississippi, Hazlehurst. Most people haven't heard of
8 it.

9 Q. And where do you currently reside now?

10 A. I live in western New York, a small town called
11 "Ithaca."

12 Q. And what's your current profession, Dr. Wicker?

13 A. I'm a professor.

14 Q. And are you a full-time professor? Part-time?

15 A. Full-time.

16 Q. And what's your position at Cornell?

17 A. I am a full professor.

18 Q. In what department are you professor in?

19 A. I'm in the department of electrical and computer
20 engineering. I'm also in the fields of computer science,
21 applied mathematics, and information science.

22 Q. Let's back up a little bit. Maybe we can look at
23 your CV here. Have you helped prepare some demonstrative
24 slides for the jury today?

25 A. Yes, I have.

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1 Q. Okay. And the first one, Defendant's Exhibit 167,
2 is this an excerpt from your CV?

3 A. Yes. It's the first page.

4 Q. Where did you go to -- start with college. Where
5 did you go to school, Dr. Wicker?

6 A. Okay. I was living in Virginia. My father was in
7 the Navy when I graduated from high school; so, I
8 attended the University of Virginia as an undergraduate.

9 I then went to Purdue University in Indiana to
10 get my master's degree, and I received my PhD from the
11 University of Southern California in Los Angeles.

12 Q. And how long have you been teaching at Cornell?

13 A. Let's see. I've been at Cornell since 1996; so,
14 15 years, going on 16 years.

15 Q. Do you have any industry experience, nonteaching
16 experience?

17 A. Yes, I do. When I lived in Los Angeles, I worked
18 for a company called "Hughes Aircraft" for four years.
19 It's a company that at the time made satellites, both
20 commercial and defense satellites, and a wide variety of
21 spacecraft.

22 Q. And what types of jobs did you do at Hughes
23 Aircraft?

24 A. My main job at Hughes Aircraft was to design the
25 communication payloads. That would be the part of the

1 satellite that actually talks, that communicates back
2 with the ground, relays data, images of planets and that
3 sort of thing.

4 Q. Now, Dr. Wicker, are you on any sort of boards or
5 advisory committees currently?

6 A. Yes. I've done a lot of consulting for the United
7 States Government. Last summer I was appointed by the
8 secretary of the Air Force to the Air Force Scientific
9 Advisory Board. I've also served as an editor for a
10 number of journals, for professional industrial
11 societies. It's a part of our work as professors that we
12 call "service." You're expected to go out and do
13 something for your profession and for the community.

14 Q. Now, how about research? What kind of research
15 are you working on now, Dr. Wicker?

16 A. Most of my research is at the intersection of
17 computer science, computer engineering, and electrical
18 engineering. I'm very interested in large-scale
19 communication networks, sensor networks, and in
20 particular problems of privacy and security that arise
21 when people spend a lot of time on the Web.

22 Q. Okay. Now, Dr. Wicker, do you have any patents?

23 A. Yes, I do.

24 Q. How about any recent patents? Have you been
25 granted any recent patents?

1 A. My most recent patent involves sensor networks.
2 Some friends and I -- some colleagues and I worked on a
3 system by which we could take a very thin film, something
4 literally like a sheet of paper, and mount a bunch of
5 sensors on it and these sensors could communicate the way
6 normal sensors do but what was interesting about the
7 invention for us is that, like paper, it could move. In
8 fact, you could roll it up.

9 And, so, what we did was we created sort of a
10 sock that you could unroll inside a pipeline and the
11 sensors would report back if there had been damage to the
12 pipeline of some kind or another. This same material,
13 the same flexible set of sensors, can be used in
14 landfills so that over the years as the landfill falls
15 apart, the sensors can detect the deterioration. There's
16 lots of other applications as well.

17 Q. Okay. Dr. Wicker, I'd like to move on a little
18 bit to what Mr. Cordell was talking about. What sort of
19 questions were you asked in this case to look at?

20 A. Well, there were a number of questions; but there
21 were two basic questions which you can see on the screen.
22 The first, I was asked to determine whether or not the
23 accused products actually infringe the asserted claims of
24 the patents-in-suit.

25 And the other basic question that I was asked

1 was to determine whether or not these patents are valid
2 and in particular whether or not someone had come up with
3 what had been patented before the patents had been
4 applied for.

5 Q. Okay. And one of the things that you looked at
6 was the demonstration we just saw from Mr. Novacek; is
7 that right?

8 A. Yes. In fact, I actually had the opportunity to
9 play with those machines and do the same things that you
10 just saw Mr. Novacek do.

11 Q. Now, we'll get to that second question later on,
12 and probably tomorrow. Let's talk about the first
13 question, whether or not the accused products were
14 infringed by the patents-in-suit.

15 What was the process you went through with
16 respect to this first question?

17 A. Well, there were a number of things that I had to
18 study to get up-to-speed so that I would know basically
19 what the assertions of infringement were and what had
20 been accused.

21 The first thing I did was to study the patents
22 themselves, the '076 and the '178 patent, as well as
23 their file histories.

24 And I think the file histories have been
25 mentioned; but they're basically the back-and-forth

1 between the inventor and the Patent and Trademark Office,
2 sort of the conversation they have as the inventors try
3 and get their patent issued.

4 Q. Okay. Let me stop you for one second. Mr. Logan
5 and Mr. Call's depositions, did you read those as well?

6 A. Yes, I did.

7 Q. Okay. We can continue, please.

8 A. I also studied Dr. Almeroth's infringement
9 opinions. He is Personal Audio's expert, and he's filed
10 a number of reports and declarations as this case has
11 gone along. So, I looked at the things he'd said and
12 studied his various writings, as you see there.

13 Q. Now, Dr. Wicker, as part of the process, were you
14 responding to Dr. Almeroth's opinions in his infringement
15 reports?

16 A. Yes. And in particular, I was given the
17 opportunity to read his infringement reports -- I guess
18 there were actually two of them -- and write responses;
19 in other words, say what I thought with regard to whether
20 or not he had actually proven his case.

21 Q. Okay. Now let's continue more regarding
22 Question 1 and the process and the facts that you looked
23 at at Apple and other documents. Explain that, please,
24 to the jury.

25 A. Okay. Another thing I had the opportunity to do

1 was to actually go to Apple's offices in Cupertino,
2 California. I interviewed a number of people, and in
3 particular Jesse Boettcher who testified, I believe it
4 was, earlier today. I got to sit down with him and ask
5 him lots of questions about the code, and he had -- it
6 may have been the same computer. I don't see it anymore.
7 But he had that large box computer that had all the
8 software on it. And, so, I was able to ask him to
9 explain to me where he thought various things were and
10 then I could look at the code and see whether or not I
11 thought it worked like he said it did and it always did.

12 I also talked to a gentleman named Chris
13 Wysocki. He was more on the iTunes side, as we've
14 discussed. I was able to review their deposition
15 testimony.

16 I examined a number of the accused products,
17 including all of these; and there were a few more. They
18 may no longer be in the case. But I looked at a large
19 number of Apple products, again looked at Apple's source
20 code; and most importantly, in determining whether or not
21 there was infringement, I looked at the court's claim
22 construction. I took his Honor's memorandum and opinion
23 and studied it to determine what he had determined the
24 claims actually meant.

25 Q. Now, some of the Apple source code, did you have

1 to come to Houston to review that source code at the
2 office of my law firm?

3 A. I did. In fact, I had to sit in your offices with
4 that large box -- it had all the locks on it -- and study
5 the code.

6 Q. Okay. Now, regarding the court's claim
7 construction, in forming your opinions, did you apply the
8 court's claim constructions exactly as Judge Clark has
9 given them?

10 A. Yes.

11 Q. Okay. So, let's move on. First let's preview for
12 the jury, if you could, what some of your conclusions
13 were; and then we'll start to walk through each one of
14 those, if that's okay.

15 A. Okay. There were basically three different things
16 that I found that troubled me with regard to the
17 infringement allegations.

18 First off, Personal Audio's software method,
19 the scanning for location types, LocTypes, I didn't see
20 that in the accused products. And, frankly, I think we
21 all are in agreement, both sides, that they are not
22 physically there. Those methods are not actually
23 implemented.

24 The second thing that was problematic that I
25 found in the infringement contentions was that there was

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1 no download request. The iPods when they are connected
2 to -- I'll just pick one. This is a nice one
3 (indicating).

4 When you connect your iPod -- or any iPod to a
5 computer, this device doesn't make a request. As we
6 heard today, it simply goes into dumb hard disk mode and
7 just sits there. All the action comes from the computer
8 running *iTunes*. No request comes from this device. So,
9 that's something that troubled me with the assertions of
10 infringement.

11 And then, finally, over the last couple of
12 days there have been a number of assertions that a
13 particular structure that's been required by the court
14 isn't present but what is present is somehow equivalent.
15 There were three or four of those that I really had
16 problems with because I thought that what -- the
17 structures that were being identified were substantially
18 different from what the court required.

19 So, that -- I sort of bundled all of those
20 under three; but there are really four pieces to that
21 that caused me concern.

22 Q. Okay. Let's talk about the first one, the
23 Personal Audio software method, if we could. Here's the
24 questions up again. Let's focus again on the first one.
25 What claims are we talking about here? We've talked a

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1 lot about the claims and the limitations. I want to make
2 sure we're specific, with regard to the jurors'
3 notebooks, what limitations we're talking about and what
4 claim constructions.

5 A. Okay. So, in putting this slideware together,
6 what I did was I've picked out the portions of the claim
7 that specifically have been required by the -- that have
8 been interpreted by the court -- excuse me -- to require
9 this scanning for a particular LocType, the specific
10 algorithm that has been described in the Personal Audio
11 patents.

12 Now, within this context you'll see I've got
13 1D, 1F. That means the fourth and the fifth elements
14 that are in that particular claim.

15 And to the right of that I've got the
16 definitions as found in the jury notebooks. So, the
17 fourth element of claim 1, the associated definitions can
18 be found on page 2 of your notebooks; the fifth element,
19 pages 3 through 4; and so on.

20 Q. And, Dr. Wicker, we're on the '076 patent; is that
21 right?

22 A. That's correct. I'm sorry. I should have
23 mentioned that.

24 Q. Okay.

25 MR. ELACQUA: And that's Plaintiff's

1 Exhibit 1, for the record.

2 BY MR. ELACQUA:

3 Q. Now, we're still in the '076 patent. There's a
4 couple more limitations here. What limitations are these
5 we're talking about?

6 A. Okay. What we see here are the fifth and the
7 sixth limitations of claim 14 and the first limitation of
8 claim 15.

9 Q. Okay.

10 MR. ELACQUA: Again this is Plaintiff's
11 Exhibit 1 for the record, the '076 patent.

12 BY MR. ELACQUA:

13 Q. Now let's look at the '178 patent, claim
14 limitations that talk about the algorithm we've been
15 discussing over the last week.

16 A. Okay. The first one from the '178 patent is the
17 fifth element, element E of claim 1. And just so I'm
18 clear, the highlighted portion is the specific language
19 I'm talking about that's been construed by the court to
20 have specific requirements. It's "a processor for
21 continuously delivering a succession of said audio
22 program files." And we see some similar language in the
23 first element of claim 6 of the '178 patent where it says
24 "said processor responds to a skip backward program
25 selection command." This again requires specific things

1 according to the court's claim construction.

2 Q. Okay. Let's take -- again finish up the
3 '178 patent with claim 14. If you could describe for the
4 jury what we're looking at here. I apologize. It looks
5 like there is a line through the middle, but it says --
6 it's in the jury notebook definitions at page 12 through
7 13.

8 A. Okay. So, that's the sixth element of claim 14,
9 "a processor for executing one or more utility programs
10 to perform control functions in response to said input
11 commands from a user."

12 THE COURT: If that can be expanded, it might
13 help a little.

14 MR. ELACQUA: It can, your Honor. This is
15 maybe for the --

16 THE COURT: Okay. That's fine.

17 BY MR. ELACQUA:

18 Q. So, Dr. Wicker, let's take a look at one of the
19 claim constructions from Judge Clark on this. This is
20 the next slideware. I think it's a number of the
21 elements of this algorithm, if you could remind the jury
22 again what we're talking about, what kind of claim this
23 is and explain the function and the required structure.

24 A. Okay. It is my understanding this is what's
25 called a "means-plus-function claim." It's got two parts

1 to it. It's got a function that's been defined by the
2 court. That's -- let's see. I don't have a pointer.

3 But you can see it. It's right next to the
4 word "definition."

5 THE COURT: Do you need a pointer, doctor?

6 THE WITNESS: Yes, your Honor, if you don't
7 mind.

8 MR. ELACQUA: I have one, your Honor. May I
9 approach?

10 THE COURT: Yes, please.

11 MR. ELACQUA: I thought one was up there.

12 THE WITNESS: It may be. I don't see it.

13 THE COURT: The government's on a tight
14 budget, ladies and gentlemen.

15 A. And I'll apologize for aiming over people's heads
16 here. I'll be very careful.

17 So, again, this is a means-plus-function
18 claim; and as I understand it, there are two parts that
19 are required by the court for all means-plus-function
20 claims. There's a specific function that must be
21 identically performed, exactly performed, and a
22 structure.

23 Now, the structure that's required can be
24 identically present; or an equivalent can be present.
25 And that structure has to implement -- it has to be tied

1995

1 back to the function. It has to actually do that
2 function.

3 BY MR. ELACQUA:

4 Q. Okay. Let me stop you, Dr. Wicker, just for a
5 moment. The structure part after the highlight in the
6 middle, explain that for the jury where it starts with "a
7 general purpose computer."

8 A. Okay. So, again, this happens to be the claim
9 construction for "means responsive to said first command
10 for discontinuing the reproduction."

11 Now, the structure that's required for this
12 means-plus-function claim element is "a general purpose
13 computer programmed to perform the algorithm that is
14 illustrated in the flow chart of Figure 3" -- and that's
15 Figure 3 of the patent -- "at items 269 and 235" -- those
16 are pieces of that particular algorithm; they're actually
17 numbered boxes in Figure 3 -- "and more fully described
18 at Column 15, lines 21 to 25 and Column 34, line 28 to
19 Column 35, line 48. Specifically, this algorithm
20 includes the following steps: scanning forward in the
21 sequencing file to locate the next Selection_Record of
22 the appropriate LocType" --

23 Q. Okay. Dr. Wicker, let me stop you right there
24 with Number 1. What's your understanding as to what the
25 first step of this algorithm method is about?

1996

1 A. Okay. There's been a lot of talk about
2 Selection_Records and LocTypes. Basically a
3 Selection_Record is an item that's in the sequence file.
4 It's an item in this long file of stuff. Perhaps it can
5 be played; perhaps it can't. It's a particular entry.

6 Within that Selection_Record there is a
7 LocType that tells you what kind of item that is, is it a
8 subject, is it a topic, is it a comment, is it -- you
9 know, whatever it may be.

10 Q. Okay. Let's talk about Number 2 and Number 3 now.

11 A. Okay. So, Number 2 says "resetting the
12 CurrentPlay variable to the record number of that
13 Selection_Record."

14 Okay. So, as part of "discontinuing
15 reproduction of the currently playing program segment and
16 instead continuing the reproduction at the beginning," we
17 have to reset the CurrentPlay variable to the record
18 number of that Selection_Record; in other words, go back
19 and reset that CurrentPlay so it plays the same thing
20 over again.

21 And then, finally, three, "fetching and
22 playing the program segment identified by the ProgramID
23 contained in the new Selection_Record." So, going and
24 getting the actual audio and playing it again.

25 Q. Okay. Now, I know you just mentioned this before.

1997

1 This Selection_Record structure shows up throughout this
2 algorithm; is that right?

3 A. Yes, it does.

4 Q. Okay. Let's talk a little bit more about that. I
5 know the jury's heard a little bit of this. I apologize
6 for repeating. But explain again for the jury sort of
7 how this comes about in the patent and what the
8 Selection_Record structure is about.

9 A. Okay. This is from Plaintiff's Exhibit 1. You
10 see on the bottom left it tells you where I got these
11 particular cites. I'll start with Column 32, lines 1
12 through 9. This is where Selection_Record is actually
13 defined in the patent, and this is an actual piece of
14 code. It's written in a language called "Pascal." I
15 think Pascal has been mentioned several times. It's
16 actually made me feel old. Everyone says they got it in
17 middle school. I got it in grad school. But anyway,
18 there it is.

19 So, it says (reading) Selection_Record equals
20 a record. It's of a particular type. It's a particular
21 data structure. And this structure has two things in it.
22 It's got a LocType, which is a character; and it's got a
23 location, which is an integer.

24 So, if you've got a Selection_Record,
25 according to this definition, you've got two things.

1 You've got a LocType, and you've got a location.

2 Q. Okay. Now, Dr. Wicker, are these Selection_Record
3 structures used throughout the claim construction we just
4 looked at regarding "fetching and playing and resetting
5 the CurrentPlay available" and things like that?

6 A. Yes. Yes. If you look through the claim
7 construction, you'll see there's a lot of reference to
8 scanning to find a particular LocType, for example.

9 Q. I know we've talked about this. Were you here
10 when Mr. Call testified?

11 A. Yes, I was.

12 Q. Okay. And have you been here since the beginning
13 of the trial to hear all of the witnesses testify?

14 A. Yes, I have.

15 Q. Okay. What's this table in reference to,
16 Dr. Wicker?

17 A. Okay. This is another piece of the patent or one
18 of the patents. It's Plaintiff's Exhibit 1, Column 32,
19 lines 12 through 33. I think this chart's been shown
20 several times now.

21 Mr. Call talked about it in some detail. What
22 we have are a wide variety of LocTypes that are defined
23 within the patent. I've highlighted a few as the ones
24 that have been discussed in most detail, subject
25 announcement, a topic, and a programming content segment.

1999

1 And just to remind you, the subject might be music; the
2 topic could be country music; and the programming content
3 segment, that could be an actual country music song, you
4 know, whether by Elvis or whoever, Patsy Cline.

5 Q. Now, you said you were here for Mr. Call's
6 testimony, right?

7 A. That's right.

8 Q. Okay. And I think the next slideware is a callout
9 from Mr. Call's testimony where he describes a scanning
10 forward in the Selection_Record structure.

11 A. That's correct.

12 Q. Explain for the jury what's up here.

13 A. Okay. So, what Mr. Call said was that basically
14 with regard to the "subject skipping you just talked
15 about, it would scan forward through this file to find
16 the next subject record." Oh, that's actually the
17 question.

18 And then Mr. Call said, "Yes, sir."

19 So, what happens is you've got a subject
20 record here, and it's got an associated ProgramID. Now,
21 when you scan for the next LocType of the same type,
22 you're going to follow -- I can just barely see the line,
23 but you're going to go all of the way down here
24 (indicating) to this subject. That's the next subject
25 record in this list. So, it's going to scan. It's going

2000

1 to look at all these. No. No. None of these are
2 subjects. Wait. There's one. And it's going to stop
3 there and use that particular ProgramID.

4 Q. Now, were you here also when Mr. Goessling was
5 just on the video up there?

6 A. Yes, I was.

7 Q. Okay. When he was talking about trying to go
8 through 40 entries with 2 jumps as opposed to 40 times?

9 A. Yes, that's right.

10 Q. Let's talk about the accused iPods here and what's
11 been accused of meeting this software method. Okay?

12 A. Okay.

13 Q. Okay. Now, explain for the jury what this
14 slideware is up here and how this relates to your
15 opinion.

16 A. Okay. This slideware -- on the left we can see a
17 particular iPod. In fact, I think it's this variety here
18 (indicating), Defendant's Exhibit 102. What's being
19 shown here is a particular playlist of Nineties music.

20 Now, what's being accused of infringing what
21 we've been talking about is a particular playlist and the
22 way it is played on an iPod. But the way it's played on
23 an iPod is very straightforward. It's simply one thing
24 after another. If we are playing this particular entry
25 right here (indicating), the software that is executed --

2001

1 it went away really fast. Let's hold it there for a
2 second. There is a piece of software code called
3 "GetNextPlaylistTrack." And that code is what's going to
4 move us through this particular playlist. And what we'll
5 see is simply one thing after another. There is no
6 scanning. There is no looking for anything. You simply
7 play one thing after another.

8 Q. Okay. Now, Dr. Wicker, do you have an opinion as
9 to whether this going from one to two to two to three is
10 equivalent to the scanning algorithm that Judge Clark has
11 given?

12 A. I don't think it is equivalent. I think it's
13 substantially different. What's being done here doesn't
14 have any of the capabilities that Mr. Call talked about.
15 It's simply one thing after another.

16 Q. Now, you were here also for Dr. Almeroth's
17 testimony; is that right?

18 A. Yes. That's correct.

19 Q. And what's on the screen now relating to that?

20 A. Okay. That's Dr. Almeroth, and this is something
21 that he said. I think it was -- oh, I've lost track of
22 the days; but it was a few days ago. He said, "the code
23 is complex enough that you don't have to look at a
24 LocType to determine what the next type of record is
25 program" -- did I read that correctly? "The code is

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1 complex enough that you don't have to look at a LocType
2 to determine that the next type of record is program."

3 Q. And do you agree with Dr. Almeroth?

4 A. I certainly agree that the code is complex and it
5 certainly doesn't look at LocTypes. So, I do agree with
6 that part.

7 Q. So, let's come back to the method that we talked
8 about when we first started with the different structures
9 and the different pieces involved here.

10 Now, were you in the courtroom for Jesse
11 Boettcher's testimony?

12 A. Yes, I was.

13 Q. And relating to the -- what's been accused as a
14 sequencing file?

15 A. Yes.

16 Q. And what's your understanding as to what's been
17 accused as a sequencing file?

18 A. What's been accused as a sequencing file is a
19 playlist, the playlists that, well, all of these devices
20 are capable of playing.

21 Q. Now, do the accused products actually have some
22 sort of playlist file or something like that on the hard
23 drive?

24 A. Well, that's actually a complicated question. The
25 accused products on the hard drive, they have either a

2003

1 Dulcimer database or a sequel database. Actually they
2 all have Dulcimer databases. Some of them also have a
3 sequel database.

4 These are very compact files. You can't look
5 into the Dulcimer database and actually see a playlist.
6 What happens is that when you turn these iPods on, the
7 database that is stored on the hard drive will be built
8 up into RAM. In other words, it will be changed and
9 translated and turned into all kinds of different data
10 structures. That's where we find the playlists.

11 So, the playlists actually reside in RAM.

12 Q. Now, let's hold on a second with the Dulcimer
13 database just so we're making sure we're talking about
14 the right products here. Which products use the sequel
15 database?

16 A. That would be only the more recent products, the
17 last few generations.

18 Q. I think it's the nano fifth generation. Does that
19 sound right?

20 A. That's correct. Thank you.

21 Q. Okay. And the Dulcimer database, does that have a
22 specific name, "*iTunesDB*" or "Dulcimer database"?

23 A. I believe it's "iTunes.db," something along those
24 lines.

25 Q. Okay. So, in everything before the nano fifth

2004

1 generation, where is the Dulcimer database stored?

2 A. Okay. Actually the Dulcimer database is stored on
3 the hard drive of all of these products. Even if there
4 is a sequel database, there is a compressed form of the
5 Dulcimer database that's stored on the hard drive.

6 Q. So, when a user is using the accused products, are
7 they ever -- is the accused product ever accessing what's
8 stored on the hard drive?

9 A. No. When the machine is actually running, when we
10 are going through the menus, et cetera, most of what
11 we're doing is operating on material that's in RAM. And
12 remember there's two different kinds of memory. There's
13 the hard drive, which is persistent; and then there's
14 RAM. And I can't remember who said this, but RAM is fast
15 and it uses very little power. So, if you're going to do
16 a lot of computing or playing music, you want to do it in
17 RAM, not on the hard drive, because if you use the hard
18 drive a lot, you burn the power. I think Jesse Boettcher
19 talked about that quite a bit.

20 Every time you spin the hard drive, you use a
21 great deal of battery power; so, you want to do that as
22 little as possible.

23 Q. Now, in the Dulcimer database, if a user has
24 playlists on their iPod, is there any sort of specific
25 ordering or anything like that in Dulcimer database?

2005

1 A. With regard to how the playlists are ordered? I'm
2 sorry.

3 Q. With regard to the database in general. I guess
4 maybe let's step back.

5 I know Jesse Boettcher touched on this a
6 little, but sort of generally what is the Dulcimer
7 database as far as a data structure?

8 A. The data structure takes the form of a linked
9 list -- a doubly-linked list.

10 Q. Okay. Now, is there any sort of specific order to
11 the Dulcimer database as the database is stored on the
12 hard drive?

13 A. No. And I should be more careful. When it's
14 built up into RAM, it takes the form of a doubly-linked
15 list. There is actually no ordering structure at all
16 when it's stored on the Dulcimer database on the
17 persistent hard drive.

18 Q. Now, as far as playlists and things like that go,
19 who determines the order of playback on the iPod?

20 A. The order of playback, especially in terms of
21 repeats, well, that's going to be determined by the
22 person who's actually operating the iPod.

23 Q. And would that be a user of the iPod?

24 A. Exactly.

25 Q. Okay.

2006

1 A. There are a number of different settings that a
2 user can initiate on the iPod that will determine how the
3 music is going to be played.

4 Q. So, in memory with -- these in-memory data
5 structures, if a user is using the iPod, is the code or
6 anything -- is that going back to the disk; or is it just
7 using in-memory structures?

8 A. Oh, it's just going to use the in-memory
9 structures.

10 Again, every time you go back to the disk, you
11 burn more battery power. And with devices like these,
12 battery power is very, very important. If you could only
13 play music for an hour, it wouldn't be as interesting.
14 You know, the fact that it can go for 12 or 13 hours
15 makes it much more useful for, oh, a wide variety of
16 applications, for example, a long car drive or something
17 like that.

18 Q. When does it access the disk?

19 A. What happens is there's a very quick disk access
20 roughly every 20 minutes or so to load more songs into
21 memory. So, basically it's a real fast -- they called it
22 a "hit," and that's what most people do call it. You hit
23 the disk every 20 minutes or so so you can load more
24 music into RAM, and that way you won't be continually
25 spinning the disk. You just spin it briefly, just long

2007

1 enough to bring more material into the RAM so it can be
2 played later on.

3 Q. Now, based upon what we've just been talking about
4 relating to the Selection_Records, LocType, and how the
5 sequencing file is stored and accessed on the iPods, do
6 you have an opinion as to whether the software method
7 we've been talking about is met by the accused products?

8 A. It's not.

9 Q. And what does that mean?

10 A. In other words, these limitations, these claim
11 limitations that require this particular algorithm,
12 they're not met by the accused products. The accused
13 products don't do these things.

14 Q. And, so, what does that mean as far as the claims
15 we've been looking at if this limitation is not met?

16 A. Well, as was mentioned I think on the first day,
17 if a single limitation of a claim is not met, then that
18 claim cannot be infringed. You have to satisfy every
19 single limitation of a claim to infringe it.

20 So, the fact that, for example, in this case
21 several limitations of claim 1, claim 3, claim 14 and 15
22 of the '076 patent -- these limitations are not found in
23 the accused devices; therefore, these are not infringed.

24 Q. Just because one limitation is not there, does
25 that affect the whole claim?

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1 A. Yes. If one limitation is not met, the entire
2 claim is not infringed.

3 Q. Now, that's the '076 patent. How about the
4 '178 patent?

5 THE COURT: Okay. Counsel, we're going to go
6 ahead and break for the evening.

7 Ladies and gentlemen, again, remember my
8 instructions. Don't discuss the case. Let nobody talk
9 to you about it. Don't go do any research. I'll ask you
10 to be back at 8:30 in the morning. Remember that
11 tomorrow is Friday, just before the long weekend. So,
12 what we'll do is we'll start at 8:30 and wrap up between
13 12:00 and 12:15; and then that will give everyone a
14 chance to get an early start on their weekend. I will
15 see you in the morning at 8:30.

16 (The jury exits the courtroom, 5:03 p.m.)

17 THE COURT: Anything to be taken up outside
18 the presence of the jury by Personal Audio?

19 MR. SCHUTZ: My crack team once again informs
20 me no, your Honor.

21 THE COURT: Okay. And Apple?

22 MR. ELACQUA: Your Honor, I do have one matter
23 that Mr. Holdreith brought up earlier. We do intend to
24 rely on the NewsComm thesis as a piece of prior art in
25 this case. I know there's been a dispute as to whether

2009

1 we could actually prove that being prior art. There is a
2 declaration from MIT that we're relying on. I would like
3 to be able to at least have Dr. Wicker be able to rely on
4 that, which I think he's able to do as far as relying on
5 hearsay evidence if your Honor determines that it is
6 hearsay. I don't think it is but --

7 THE COURT: Well, of course, just because --
8 an expert can rely on something but in that case it would
9 be hearsay and he can't go ahead and describe it, show
10 it, use it, because it's still hearsay. The rule clearly
11 says that except under certain circumstances, the
12 findings I would have to make, he couldn't go ahead and
13 display it. I mean, that may be part of his opinion.

14 I think the concern I had, as I indicated in
15 the motion *in limine*, was that we have that affidavit or
16 that declaration. I think the kinds of statements made
17 in the declaration cover most, if not all, of the
18 elements needed to prove that a printed publication is a
19 printed publication and available to the public and so
20 forth. The problem being is the affidavit itself is
21 hearsay.

22 In other words, had that lady testified by
23 deposition or deposition on written questions or
24 testified live, that would be one thing. I just don't
25 see the authority -- and maybe it's out there -- that you

2010

1 can simply bring in her affidavit.

2 Now, you cited me a case I believe before the
3 ITC or one of the other administrative bodies. But, of
4 course, the rules of evidence don't apply there. They
5 can handle things with -- by hearsay. From what I could
6 tell from the case, that particular objection wasn't even
7 raised; and it wouldn't have been in a -- and I can't
8 remember if it was the patent -- Board of Patent Appeals.
9 That's what it was. Ms. Mullendore remembers better than
10 I do. Board of Patent Appeals; so, it's basically a
11 quasi -- or it's administrative, quasi administrative;
12 and the same rules don't apply. So, that was my concern.

13 Now, if you have another way of getting it in,
14 that was the purpose of my ruling, was it was a motion *in*
15 *limine*.

16 MR. ELACQUA: Yes, your Honor. I think this
17 falls within a hearsay exception.

18 THE COURT: Okay. Which one is that?

19 MR. ELACQUA: And I would cite to 803 --

20 THE COURT: Do you happen to have a --

21 And you can step down, sir. I'm sorry.

22 THE WITNESS: Thank you.

23 MR. ELACQUA: We do have a copy.

24 THE COURT: Right. This late in the day, I
25 haven't memorized it.

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1 MR. ELACQUA: We can do it tomorrow morning if
2 your Honor -- we're not going to finish this module until
3 probably the first break. But I can provide it to the
4 court; and if you want to look at it this afternoon, I
5 think it would fall under 803(6) which I believe this
6 declaration is a proper 902(11) declaration. And, so,
7 therefore, it would qualify under a hearsay exception.

8 THE COURT: I'm pretty sure I've looked at
9 that before when I was doing that, and the problem is
10 going to be is we're going to be moving as quickly as
11 possible tomorrow to get in as much testimony as
12 possible.

13 MR. ELACQUA: I would appreciate that as well.

14 THE COURT: Why don't you -- I'm sure I've got
15 that exhibit somewhere; but if you happen to have a
16 copy --

17 MR. ELACQUA: I do. May I approach?

18 THE COURT: -- with the declaration, it would
19 be helpful.

20 MR. ELACQUA: May I approach?

21 THE COURT: Please.

22 All right. Of course, what we're talking
23 about is printed publication under 35 USC,
24 Section 102(b), and whether -- (reading) when there are
25 no facts in dispute, the question of whether a reference

2012

1 to a -- represents a printed publication is a question of
2 law, *in re Klopfenstein*, 380 F.3d at 1347, citing the
3 earlier *in re Cronyn*, 890 F.2d 1158.

4 And I'm sure counsel are well familiar it has
5 to be sufficiently accessible to the public interested in
6 the art. There has to be a satisfactory showing that it
7 has been disseminated or otherwise made available to the
8 extent that persons interested and ordinarily skilled in
9 the subject matter or art can locate it with reasonable
10 diligence. Thesis would have to be cataloged or indexed
11 in a meaningful way.

12 And in this particular case, the problem with
13 the business record exception is (reading) a memorandum
14 or report or data compilation in any form made at or near
15 the time by a person with knowledge, if kept in the
16 course of regularly conducted business activity, if it
17 was the regular practice of that business activity to
18 make the memorandum, report, record, or data compilation,
19 all as shown by the testimony of the custodian.

20 So, let's go beyond, for a minute, the
21 potential problems of Ms. Diane Geraci being a custodian;
22 and I'll compare her to the German librarian in the case
23 you cited. His affidavit at least said -- or as near as
24 you could tell -- he had been there. He was there at the
25 time the thing came in. He knew what was going on in his

2013

1 German library. He said it was what it was. And then
2 the higher court's opinion indicated that was enough for
3 the Board of Patent Appeals under their rules.

4 But let's, for the sake of argument, set aside
5 and say, all right, I'm willing to accept that even
6 though she says that they -- she says she has knowledge
7 of the library's normal business practices. Doesn't
8 really say forever, but at least since 2008. No
9 indication of whether she did it -- or knew about it
10 when -- well, she knows what the -- she has established a
11 basis she knows what the practices were since 2008. But
12 this thesis was supposedly filed in 1995. And then she
13 states based on the practices in place at the time, the
14 thesis would have happened; but she doesn't say how she
15 knows that.

16 And then she talks about how things were going
17 on in 2001 for cataloging and searching. She doesn't say
18 how she knows that.

19 And then she says that once a document was on
20 the shelf it's available to be viewed, but she doesn't
21 say how she knows that before 2008.

22 But I think the biggest problem is that this
23 Roy -- there is no indication that he is an employee or
24 part of MIT because part of the rule, Exception 6 says
25 "it was the regular practice of that business or activity

2014

1 to make the memorandum, report, record, or data
2 compilation."

3 There is no indication that this was a
4 professor that as part of his teaching duties or
5 professorial research or part of the team there at MIT,
6 it was part of his duty to prepare this. Actually I
7 understand it may be some student.

8 MR. ELACQUA: He was a master's student, your
9 Honor.

10 THE COURT: Yeah, but that seems to be the
11 problem. And I'm just looking at what's in the
12 affidavit. So, these are the problems I'm seeing in the
13 affidavit, is establishing that it was the regular
14 practice of that business activity to make the memorandum
15 as opposed to something someone did and wanted to get
16 filed. So, that, to me, is the biggest problem with the
17 803(6).

18 If you think you can get around that, that's
19 kind of what my earlier order was, is how do we get
20 around that.

21 MR. ELACQUA: Your Honor, if I could put
22 something up on the Elmo which is the actual NewsComm
23 thesis. And while I do that, let me address your
24 question relating to whether Ms. Geraci has knowledge.

25 In paragraph 2 she does state that "I make

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1 this declaration based on my personal knowledge, my
2 knowledge and review of business records and practices of
3 the MIT libraries, and conversations with employees on my
4 staff."

5 I don't think the requirement, your Honor, is
6 that the person making a declaration had to have been
7 there in 1995; but I understand your Honor's concern.

8 THE COURT: And I said, I mean, I'll assume
9 that -- I mean, those are some concerns; but you're
10 correct. There are cases indicating that the custodian
11 doesn't have to be there for the whole time. I'm willing
12 to even accept that argument. But a real concern I have
13 is under 806 -- okay. Here is the --

14 MR. ELACQUA: So, this is the cover of the
15 NewsComm thesis, your Honor, which I think clearly
16 establishes that it was "Submitted to the Program in
17 Media Arts and Sciences, School of Architecture and
18 Planning, in partial fulfillment of the requirements for
19 the degree of Master of Science at the Massachusetts
20 Institute of Technology June 1995," copyright with MIT.

21 And it's clear, your Honor -- really that's
22 probably the best page to look at -- actually the last
23 page might have some additional information that this was
24 clearly something submitted in requirement of his thesis,
25 his master's thesis at MIT, which I think the declaration

2016

1 covers.

2 THE COURT: If you wouldn't mind letting me
3 take a look at a copy of that, or that copy.

4 MR. ELACQUA: And, your Honor, just so we're
5 clear, the last couple pages of the declaration are the
6 actual records that we're talking about, which are these
7 MARC library records that indicate timing and so forth as
8 to when something is shelved. And I believe it's
9 Defendant's Exhibit 30, page 9, is the best page to look
10 at for that. And it's Row Number 008 which shows that it
11 was shelved at 9-27 of 1995.

12 MR. SCHUTZ: Is this the one printed off the
13 Web on --

14 MR. ELACQUA: This is what Ms. Geraci
15 certified was a regularly conducted business record.
16 Looks like it was printed off *library.mit*. I'm not sure
17 if that's the Web or not.

18 MR. SCHUTZ: In 2010?

19 MR. ELACQUA: Yes, in 2010.

20 MR. SCHUTZ: Can I make a brief one-sentence
21 observation, your Honor?

22 THE COURT: Let me finish re-reading the whole
23 thing.

24 All right. Go ahead, Mr. Schutz.

25 MR. SCHUTZ: Just a couple things, your Honor.

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1 This has been extensively briefed, but I would also note
2 that the declaration itself has a double hearsay problem.
3 In paragraph 2 the declarant does not limit what she says
4 in this based on her own personal knowledge. And, so,
5 she goes on to state that -- that's part of it. But then
6 she also says it's based on her knowledge and review of
7 some business records and based on conversations with
8 employees and staff.

9 THE COURT: But where is the authority for the
10 proposition that a custodian of records can only testify
11 as to their personal knowledge? I mean, almost as a --
12 that's kind of the whole point of the business records
13 exception is IBM, been around for, well, a hundred years
14 now, their business records custodian -- the first one
15 has been dead, buried for years. They can come in.
16 Obviously it's just based on this is one of our -- this
17 is our normal course of business.

18 So, I think everybody understands a business
19 record is letting in hearsay. It's an exception thought
20 to be trustworthy. So, that comment, I'm not going to
21 base my ruling on that. So, what's your next one?

22 MR. SCHUTZ: Well, the issue, judge, if you
23 again go back and you look at what she says, we don't
24 know the difference as to what's personal knowledge
25 versus something else; and she doesn't cite -- there are

2018

1 no documents cited or attached here showing what the
2 practices were at a given time. She just says it appears
3 that it was cataloged in September 27th, '95. In terms
4 of being able to actually retrieve it so that it is
5 publicly available, the only searching that could be done
6 would be keyword searching for the title. And that's in
7 paragraph 13.

8 It could only be a search for the title. So,
9 there couldn't be searching of the body, couldn't be
10 searching in any kind of Boolean operators that are
11 commonly used today so that this would, you know, meet
12 the publicly available test. And the printout, of
13 course, is from the Web -- or from some server in 2010.
14 And, so, we don't know what this might have looked like
15 back then.

16 And again, your Honor, we did brief this
17 extensively. I'm only covering --

18 THE COURT: I've looked at -- on both sides.

19 Mr. Elacqua, attached supposedly to her
20 affidavit as Exhibit C -- oh, here it is. Okay.

21 MR. ELACQUA: It's the first --

22 THE COURT: It's back and front.

23 MR. ELACQUA: It's a copy of the thesis, your
24 Honor, which actually is stamped July 6th of 1995.

25 THE COURT: Right. No, that's --

2019

1 MR. ELACQUA: Which is obviously much earlier
2 than --

3 THE COURT: It's double -- your copy.

4 MR. ELACQUA: Double-sided.

5 THE COURT: You're copied on the back. That's
6 why I didn't find it.

7 MR. ELACQUA: Yes.

8 THE COURT: All right. Well, Chris and
9 Faith Ann need to get home. Let me take a look at this.
10 I'll let you know first thing in the morning. We're
11 going to go in recess.

12 Anything else outside the presence of the
13 jury?

14 MR. CORDELL: Just one thing, your Honor.
15 Everybody's favorite subject now is the JMOLs. Would the
16 court prefer we file that in writing?

17 THE COURT: You've made your JMOL. We're not
18 having new ones. That was the whole point of that
19 exercise.

20 MR. CORDELL: I understand, your Honor, not
21 new ones but sometimes --

22 THE COURT: No, we're not having new issues on
23 the old ones, either. You've made your JMOL prior to the
24 next part of the case. My guess is Ms. Chen or
25 Mr. Elacqua told you what my practice was because you had

2020

1 the most thorough set of JMOLs on your feet that I've
2 ever seen. But, no, that's -- and I think they were
3 quite thorough. I don't think it is unfair to say that's
4 what you've made. They were quite complete.

5 MR. CORDELL: Well, thank you, your Honor. I
6 really just offered it. That was my only intention.

7 THE COURT: And as I said, from Personal Audio
8 all I'm really interested in in response at this point
9 would be the record citations where you say that the
10 things that Mr. Ruffin [sic] said were not there are
11 there.

12 MR. HOLDREITH: Understood, your Honor.

13 THE COURT: Okay. All right. We'll be in
14 recess. We'll start again at 8:30 in the morning.

15 (Proceedings adjourned, 5:27 p.m.)

16 COURT REPORTER'S CERTIFICATION

17 I HEREBY CERTIFY THAT ON THIS DATE, JUNE 30,
18 2011, THE FOREGOING IS A CORRECT TRANSCRIPT FROM THE
19 RECORD OF PROCEEDINGS.

20 
CHRISTINA L. BICKHAM, CRR, RMR

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